



Bulletin of the
NATIVE PLANT SOCIETY OF OREGON

To increase the knowledge of members and public in identification
and conservation of the native plants of the Pacific Northwest

VOLUME 23 NUMBER 1

JANUARY 1990

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips will take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Blue Mountain

22 Jan., Mon.

Feel free to call if you have any questions. Contact Bruce Barnes (H-276-5547; O-278-2222).

MEETING. 7:30pm, Room 130, Morrow Hall, Blue Mountain Community College. Program to be announced.

26 Feb., Mon.

MEETING. 7:30pm, Room 130, Morrow Hall, Blue Mountain Community College. Program to be announced.

Corvallis

For information, contact Wes Messenger (929-4002).

Emerald

8 Jan., Mon.

MEETING. 7pm at Westmoreland Community Center, 1545 W. 22nd. Steve Gordon will speak on wetlands.

High Desert

For information, contact Marge Ettinger (382-2255).

Mid-Columbia

3 Jan., Wed.

MEETING. 7:30pm at the Mosier School. Barbara Robinson will present a multimedia program on "Wildflowers of the Mid-Columbia", featuring the Tom McCall Preserve of the Nature Conservancy.

7 Feb., Wed.

MEETING. 7:30pm at the Mosier School. Susan and Jerry Gabay will present a slide program featuring the "Floral Highlights of Mt. Rainier".

North Coast

For information, contact Sallie Jacobsen (842-4350).

Portland

9 Jan., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Don Barr will present an illustrated lecture on the geology and flowers of the Olympic Mountains.

20 Jan., Sat.

WORKSHOP. Meet at 9:50am in Lewis & Clark parking lot, 0615 SW Palatine Hill Rd.—enter gate 3, proceed to east parking lot along cobblestone lane past Security Bldg. Workshop will be in Biology Lab at 10am. Study "Techniques of Taxonomy" using Hitchcock with Dr. Ed Florance.

27 Jan., Sat.

WORKSHOP. Meet at 10am at First United Methodist Church, 1838 SW Jefferson, Portland. Study "Using Laws as Tools to Conserve Plants", with Dr. Linda McMahan.

3 Feb., Sat.

WORKSHOP. Meet at 10am at First United Methodist Church, 1838 SW Jefferson, Portland. Study "Ethics of Plant Collection and Herb Usage" and present market conditions with Krista Thie.

10 Feb., Sat.

WORKSHOP. Meet at 10am at First United Methodist Church, 1838 SW Jefferson, Portland. Study "Crucifers and Carophylls: Their Natural History and Taxonomy", with Dr. A. R. Kruckeberg.

Siskiyou

11 Jan., Thur.

MEETING. 7:30pm in Rm. 171, Science Bldg., Southern Oregon State College. Donn Todt of the Ashland Parks and Recreation Department will give a slide program on relict and disjunct plant distributions as indicators of past environments along the Oregon-California border.

Umpqua Valley

18 Jan., Thurs.

MEETING. 7pm at the Forest Service Office, 2900 Stewart Parkway, Roseburg. Naomi Neyerlin will speak on rare plants of the Umpqua National Forest.

27 Jan., Sat.

FIELD TRIP on the North Umpqua Trail. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. Purpose of the hike will be to observe the dormant forest and the plant world when not in flower. Examine twigs, buds, branches, bark patterns and spent seed capsules. Leader: Jack Hausotter (874-2462).

15 Feb., Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Slide presentation by Jack Hausotter on "World of the Lichen".

24 Feb., Sat.

FIELD TRIP. "World of the Lichen". Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. A lichenologist will identify and discuss the lichen we find on trees, shrubs and rocks. Exact location of the trip to be announced. Leader: Clayton Fraser, Lichenologist. For more info call Jack Hausotter (874-2462).

Willamette Valley

15 Jan., Mon.

MEETING. 7pm at First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State Street). "Favorite Flower Slides and UFO Night" (Unidentified Flowering Objects).

William Cusick

For information, contact Karen Antell (963-0267).

THE PRESIDENT'S COLUMN

THE NPSO AND THE ENDANGERED SPECIES ACT: A DILEMMA?

Endangered Species! They're in the news and on everyone's mind—including the members of the NPSO.

I've had more than the usual number of calls, letters, and conversations recently regarding rare, threatened and endangered plants. It seems like a good time to bring NPSO members up to date on the discussions that are taking place.

The NPSO has set itself up, in Oregon, as the primary advocacy group for our state's native plants, particularly its rare and endangered ones. This is as it should be. We were the primary sponsor of Oregon's Endangered Species Act in 1987. Our members have been collecting information about rare plants for decades. They started the rareplant conservation movement in our state. No other organization has staked out this territory, even though some other groups such as The Nature Conservancy, The Audubon Society, The Sierra Club, and the Oregon Natural Resources Council are all very sympathetic. They look to the NPSO for scientific support and political direction.

I've heard several concerns expressed by NPSO members. With Oregon's recent robust economic growth, threats to plants are great. More trees are being cut than ever before, more land is being developed, and there is more pressure to use our resources to produce commodities. Specifics include a proposed pulp mill in Klamath Falls that would destroy the primary site for the extremely rare *Astragalus aplegatei*. In Malheur County, rare plants are directly threatened by cyanide leach gold mines. The Kalmiopsis Wilderness Area is threatened by similar mining. The USFS and BLM are very uneven in surveying for and protecting sensitive species. *Stephanomeria malheurensis*, one of only two listed plants at the time, was allowed to become extinct in the wilds under BLM management. Status surveys and management plans for rare plants are usually woefully lacking. Many agencies are in daily violation of both the spirit and letter of the Federal Endangered Species Act.

The Federal listing process in Oregon for sensitive plants has been ridiculously slow. Oregon now has three taxa listed (including one now extirpated) and still nearly one hundred waiting. Recent disclosures surrounding the timber supply controversy have made it clear that there is strong political pressure

within the U.S. Fish and Wildlife Service not to list endangered animal species, confirming the impressions of many conservationists who have been involved in this long process. It seems safe to assume that the same situation is true for our endangered plants. A high-up U.S.F.&W. official has been reportedly quoted by reliable NPSO members as telling them that "plants don't have a constituency" so that the official felt little pressure to carry out the law and list them! I wonder what he thinks 890 NPSO members in eleven chapters statewide represent, if not a constituency?

It seems possible that occasionally a 2x4 may be needed to get an agency's attention. For other groups, that 2x4 can be legal action or administrative appeals. Administrative appeals and lawsuits have gained attention for our Ancient Forests and created a political and conservation opportunity that didn't previously exist. The NPSO has, so far, refrained from these actions.

The questions I am increasingly being asked is: What can the NPSO do to fulfill its mission as the major advocate for Oregon's native vegetation, especially its rare species?

This is a question that the Society as a whole must answer. How can we infuse new vigor into our T&E program? What can each of us do locally to help? Should we consider appeals and suits as part of our options? Previously, we have carefully avoided this. Some members, however, are concerned that our options are running out. Years of pressure on agencies have produced some satisfactory results, such as botanists in the BLM districts, but there is concern that our efforts will not be as effective as we'd like them to be until we are willing to back up our requests with forceful action. Until now, the NPSO has been appropriately reluctant to enter into causes that may involve legal remedies. Has the time come to change that?

This topic deserves discussion throughout the Society, between individuals, in chapters, and among Board members. Please feel free to make your feelings known in the Bulletin or chapter meetings or write to me with your ideas.

—Stuart G. Garrett, MD
President, NPSO

BITS AND PIECES

—News and Information From All Over

BLM SENSITIVE PLANT SURVEY WORK

During the 1990 field season, the Eugene BLM District Office will be contracting out Sensitive Plant Survey work. The contract will be solicited in February and will be awarded in April. The work period will begin in late April and extend through July, 1990.

If you are interested in doing rare plant surveys for the Eugene BLM District, please contact Betty Murdock, Contract Officer, at (503-683-6970) or write to her at Bureau of Land Management, Eugene District Office, P.O. Box 10226, Eugene, Or. 97440.

NPSO PRESIDENT STU GARRETT IN THE OREGONIAN

Stuart Garrett, NPSO President, has been featured in two November *Oregonian* articles which appeared only ten days apart. The articles have offered good publicity for both the NPSO and for issues of importance to the society's members.

Nov. 14 the *Oregonian* published the article "Cyanide Leach Gold Mining: State Faces Difficult Choices", written by Stu on the cyanide leach mining situation in Oregon. The byline identifies the author as president of the NPSO. The article covers the cyanide leach mining process, its aftereffects, the lack of effective state mining laws, and recommends specific actions at the state level. Stu also wrote "Getting Ready for Cyanide Leach Mining" in the June 1989 *Bulletin*.

An article on the potential Newberry Volcanoes National Monument on Nov. 24. One of three photos featured our president, and the article leads off with his name. The text describes the geology and hydrothermal potential of the Newberry area, and covers the competing forces who want very different uses of the area. The recently introduced Congressional bill to create the National Monument has wide support and passage is seen as likely.

"NECTAR AND POLLEN PLANTS OF OREGON AND THE PACIFIC NORTHWEST" Released

This is an illustrated dictionary of the pollen and nectar producing flora of our area. The book has a wide range of facts about the plants between its covers, but setting the book apart from the usual flora is information on pollen and nectar production from what beekeepers call 'bee plants'. This is of interest to naturalists, horticulturists, ecologists and botanists as well.

Authors are Michael Burgett, Associate Entomology Professor at OSU, La Rea Johnson, Assistant Curator of the OSU Herbarium, and Beryl Stringer, who is active in the Oregon State Beekeepers Association. The soft cover book has 160 pages and over 250 line drawings. It is available for \$11.95 postpaid from Honeystone Press, PO box 511, Blodgett, Or. 97326.

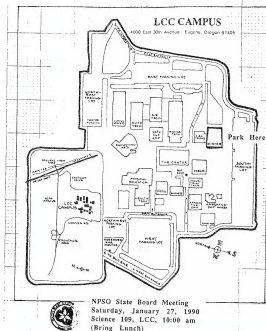
An article in *The Plant Press*, newsletter of the Arizona Native Plant Society, brings home the similarity of conservation issues nationwide. The article on a proposed ski area expansion publicizes problems of the proposal and Forest Service handling of it, similar to the Mt. Hood Meadows issue. Both are on Forest Service land and increase summer use. "The environmental assessment... was not nearly thorough enough to adequately address this issue." Proposed new facilities "...would have numerous serious impacts by...destroying a substantial area of old growth". Long used trails and wildlife of the area would be impacted. The Arizona project eliminates a population of orange-crowned warblers, impacts Mexican spotted owls, and destroys 20% of a unique plant association. The Arizona article ends with "The Forest Service has a policy practiced through the west whereby it works to accommodate the economic viability of a private investor who utilized public lands. Clearly the long-term public interest dictates that it should place greater emphasis on protecting natural resources".

STATE BOARD MEETING JANUARY 27 TH IN EUGENE

Ever wonder how the Native Plant Society of Oregon manages its diverse statewide activities? Your chance to see our far-flung State Board organization in action is in the Science Building at Lane Community College in Eugene on January 27th. Take the 30th ave. exit off I-5 and turn west. We will meet in Rhoda Love's botany classroom, Room 109 (see the map provided below). Meeting time is 10 am. No restaurants are located nearby, so bring lunch as the meeting will last until approximately 2pm. All NPSO Board meetings are open to the public and members are encouraged to attend and participate.

Please send **AGENDA ITEMS** to President Stuart Garrett by January 7th.

The voting members of the State Board of the NPSO include State Officers, Chapter Presidents, and the Directors of the organization. The number on the State Board varies but currently is 21. A quorum is needed at each meeting to conduct business. Each Board member has a report to make on the activities they direct or oversee. In an organization such as ours communications are essential in carrying out our purposes and in reaching our goals. Attendance by all Board members is needed to assure the clearest communications possible within our organization. If Board members cannot attend, they are asked to either send a representative or submit a written report to the secretary prior to the meeting.



SPECIAL PRODUCTS FROM NORTHWEST FORESTS—A CONFERENCE

Past, present, and future perspectives on the growth and stewardship of forest commodities other than timber will be the focus of discussions, February 8–10, 1990. Wild harvest for food, floral, and landscape uses will be among the major topics. NPSO will be represented by two speakers: Sallie Jacobson will cover landscape and nursery products during a session on manufacturing, marketing, and regulatory considerations; Jean Siddall will present an environmental perspective on managing and harvesting specialized forest products. By attending, NPSO members can show support for conservation and share their ideas and experiences with Northwest landowners, managers, researchers, and policy makers.

Costs for the conference start at about \$100. A program with registration information can be obtained from your local NPSO chapter president or the World Forestry Center, 4033 S.W. Canyon Rd., Portland, OR 97221.

—Dan Luoma, past President NPSO

GRANT PROPOSALS REQUESTED

The Native Plant Society of Oregon will continue to sponsor small research grants. The objectives of the program are:

- 1) to stimulate basic field research into the biology and distribution of Oregon's native and naturalized flora and vegetation, particularly in the more remote areas of the state, and
- 2) to promote native plant conservation through better understanding of Oregon's flora and vegetation and the factors affecting their survival.

Persons interested in applying for funding can obtain a copy of the program policy and guidelines from Dan Luoma, Research Grants Committee Chair, 2912 N. W. Arthur Ave., Corvallis, OR 97330. Research proposals will be due by March 1, 1990.

—Dan Luoma, past President NPSO

NOMINATING COMMITTEE REPORT

The nominating committee has submitted the following list of candidates for the NPSO Board of Directors for the 1990-91 season.

<u>FOR PRESIDENT:</u>	Stephanie Schulz, Emerald Chapter
<u>FOR VICE PRESIDENT:</u>	Dr. Dan Luoma, Corvallis Chapter
<u>FOR SECRETARY:</u>	Sue Y. Vriilakas, Portland Chapter
<u>FOR TREASURER:</u>	Tom Chereck, Portland Chapter
<u>FOR DIRECTORS AT LARGE:</u>	Paul Lemon, Siskiyou Chapter
	Tom Kaye, Corvallis Chapter
	John Christy, Portland Chapter
	Kathy Schutt, Willamette Valley

If any members desire to nominate any other member or members for any of the above positions, contact anyone on the Nominating Committee by Jan. 10th, so that your nomination can be placed in the following month's *Bulletin*. Ballots for voting will be included in the March *Bulletin*. New officers will be installed in June at the annual meeting. Names and numbers of the committee members are as follows:

Marjorie Willis, chairperson, 2356 Crestview Drive, S., Salem Or., 97302 (H-364-7772; W-378-6290)
Frank Lang (H-482-5235)
Tom Chereck (H-382-5156; W-378-2441)
Bryan Boyce (H-655-4457)

The nominating committee extends its thanks and gratitude to each of the candidates for their willingness to serve the NPSO membership.

THANK YOU!

The dates for the 1990 Annual Meeting will be the weekend of June 8,9 and 10. Hosted by the Blue Mountain Chapter in Pendleton, the meeting should prove to be most interesting and worthwhile, offering a variety of interesting activities.

The site for the meeting will be the historic Bar-M-Ranch, owned and operated by Gene and Hope Baker in the beautiful Blue Mountains of Eastern Oregon. The ranch is situated along the Umatilla River, 30 miles straight east of Pendleton at an elevation of 2000 feet. The mountains on each side of the ranch climb to 4500 feet, and the ranch borders the North Fork Umatilla River Wilderness Area.

The Main Lodge was constructed in 1864, and served as a stage coach stop between Pendleton and LaGrande. The lodge is now used by the Bakers as the Ranch Headquarters.

Some of the main ranch attractions are the home-cooked meals, comfortable accommodations, a natural hot springs swimming pool, trout fishing, and of course the beautiful array of native wildflowers. Over 50 plant families are represented in this area, including a myriad of species in the family Asteraceae, many beautiful species in the families Liliaceae and Fabaceae, and a well-represented family Orchidaceae, including *Cypripedium* and *Calypso*, and *Epipactis*, which can be seen from the pool, growing all around the hot spring itself.

So be sure and make your plans early to attend; it will be a meeting you will not want to miss. Registration forms will be in the February and March Bulletins.

BULLETIN CAN NOW ACCEPT IBM DISKS

In one more step towards complete computerization of newsletter production, the editor of the NPSO *Bulletin* can now accept submissions on IBM floppy disks. Macintosh disks are still the preferred format for submissions, but contributions may be in almost any readable form.

The NPSO State Board at their last meeting voted to budget for purchase of hardware to convert information on IBM floppies onto Macintosh format 3.5" disks. Before this was done, Portland Chapter member Joanne Benton offered use of her equipment to perform this service. Her generous offer will save the Society several hundred dollars, which can now hopefully go towards other much needed equipment.

Those with IBM compatible equipment who wish to send articles or other submissions to the NPSO *Bulletin* should send them directly to Joanne Benton, preferably in ASCII format. Allow a few extra days for remailing the converted disk to the editor. Her address is:

Joanne Benton
2924 NE Stanton St.
Portland, OR. 97212

Submissions on Macintosh disks or in other forms should be sent directly to the *Bulletin* editor. As with other submissions, those on disks will not be returned unless so requested.

Bulletin format now calls for 3.3 inch-wide columns spaced .2 inch. Leave a half-inch margin at the bottom for page numbers. The main text is in 10 point Geneva font, with the titles in 12 point **BOLD SMALL CAPS**. For further guidelines, refer to the inside back cover of your most recent *Bulletin* or contact the editor.

Abies amabilis cone
by Ramona Hammerly
Used by permission from
Northwest Trees
Stephen Arno and Ramona Hammerly



RARE BUTTERFLY -- RARE PLANT

Many closely-knit biological interactions exist between plants and insects. Particular plants, for example, may provide the sole food source for certain insect species. Herbivory by such insects can be devastating to the host plant--note how the spruce bud-worm is killing some stands of Douglas-fir and grand-fir in central Oregon--or it can be relatively benign. In sharp contrast is the mutually beneficial relationship seen in insect-pollinated species of flowering plants. By faithfully flying from flower to flower, insects not only get their food (pollen and nectar) but also help complete the reproductive cycle of their botanical hosts. Give plants credit, as well, for being able to defend themselves against insect predators; the insecticide pyrethrum is a product of the tansy genus Tanacetum, for example. Variations on the theme of insects helping or hurting plants, and vice versa, are endless.

Botanists working on the problem of threatened and endangered plant species sometimes wonder whether, by protecting a rare plant, we may also be helping to protect some unknown or unappreciated insects, which have an obligate biological dependency on that plant species. Prime candidates for such insects are those which lay their eggs on only a single plant species, and whose larvae grow and mature best only when feeding on the leaves of that particular plant. If the host plant is in an endangered or threatened status, the insect that must eat it or die is bound to be even more endangered.

Very few such relationships have thus far been identified in the flora and fauna of Oregon. One striking example, discovered only this past summer, is worth reporting on, however. In May of 1989, Dr. Paul Hammond discovered several populations of an insect known as "Fender's Blue Butterfly," all in the general vicinity of Corvallis. Bearing the impressive Latin name of Icaricia icarioides fenderi, this insect was known to have a limited range in the central Willamette Valley. However, it had not been seen by entomologists since 1937 and was assumed to have become extinct due to human alteration of natural habitats in that part of Oregon. The largest population of butterflies found by Dr. Hammond is high up on a steep, south-facing grassy hillside at the edge of the research forest maintained by Oregon State University, just northwest of the college campus.

On June 3rd of this year, I was able to visit this site in the company of Paul Hammond and Phil Hays, representing the Corvallis Chapter of NPSO. Paul pointed out to Phil and me his observation that the Blue Butterflies always associate closely with a single species of lupine, and that the females lay their eggs only on the leaves of this plant, which then becomes the sole food plant for the butterfly's larvae. I was able to identify the lupine in question as Kincaid's Lupine, Lupinus sulphureus ssp. kincaidii. Like its butterfly associate, this lupine is limited in distribution to the Willamette Valley and adjacent areas west of the Cascades, from Lewis County, Washington to Douglas County, Oregon. Kincaid's

Lupine occurs as small populations at widely scattered sites where remnant stands of native grassland are found. It is listed by the Oregon Natural Heritage Data Base as "threatened throughout its range."

This past summer, both Paul Hammond and Ed Alverson carried out extensive field searches for further stands of Kincaid's Lupine. In the early part of this century, it apparently was quite common in the vicinity of Corvallis and Salem; I have found 17 collections of it, dating from the period of 1899 to 1918, in the herbaria of Oregon State University and Willamette University. The spread of urbanization and intensive agriculture since then have drastically reduced the areas of this, and many other plants of the Willamette Valley grasslands.

Some confusion still exists as to the correct taxonomic classification of Kincaid's Lupine. Morton Peck's "Manual of the Higher Plants of Oregon" lists it as a distinct species, named Lupinus oregonus Heller. However, Leo Hitchcock--author of the influential book "Vascular Plants of the Pacific Northwest"--reduced it to a variety of the widespread species Lupinus sulphureus. It is unfortunate that the varietal name assigned by Hitchcock is not correct (due to a very obscure clause in the Rules of Botanical Nomenclature). Lupines are notoriously difficult to classify, and someone may yet make a case for giving Kincaid's Lupine full species status. For now, the most acceptable name appears to be Lupinus sulphureus esp. kincaidii (Smith) Phillips, in which the "subspecies" category,

abbreviated "ssp." replaces the variety category used in the book by Dr. Hitchcock.

Kenton L. Chambers
Oregon State University



JRJ

Lupinus sulphureus spp. *kincaidii*
by Jeanne R. Janish
Used by permission from
Vascular Plants of the Pacific Northwest
Hitchcock and Cronquist

"CASSIOPE MERTENSIANA (Bong.) D. Don, Hist. Dichl. Pl. 3: 829. 1834.

"The lover of plants is always glad to meet a member of the heath family, whether on the moors of Scotland, the heaths of England, in our shady pine woods, or as in this particular case, up among the melting snows of the high mountains.

"This alpine heather although widespread, is in the localities where it may be found, rather particular as to the place where it makes its home. With us it hibernates beneath dense banks of snow for eight or nine months of the year, appearing at first almost flat with the weight of snow. As soon as the strong but slender stems are relieved of their load they spring up and send forth almost immediately a profusion of rose tinged flower bells. On each side of the ravine [where it grows] are boulders, the smaller ones of which it attempts to cover with its somewhat trailing branches. The roots are imbedded in the gravel in the lowest depressions, continuously subjected to the icy water from the melting snow bank above. The matted plants are dense enough to prevent further erosion, and catch for their nourishment the small particles of silt and decayed vegetation.

"The exposure is nearly always to the north where the snow is late in melting and indeed often perpetual. It is also well protected from dry hot winds and summer sun.

"From these observations we gather that under artificial conditions a gravel and peat soil among rocks with plenty of moisture, and on the northern side of a rockery, would be most suitable for its successful cultivation. In horticultural literature it is frequently considered under the genus Andromeda.

"The original plant was collected by Mertens while on a tour around the world, on the island of Sitka, Alaska, at a time when the naturalist was in constant danger owing to the hostile character of the aborigines. It was described by M. Bongard as a new species in a paper entitled Observations sur la Vegetation de L'ile de Sitche, which was read before the Academy of St. Petersburg on May 4, 1831. ...

"In August, 1907, in the Smithsonian Miscellaneous Collections, Piper has reviewed this species, and finds that the plant varies sufficiently to describe three new varieties. The typical form ranges from Alaska to Oregon, the variety gracilis in the mountains of Oregon, Idaho and Montana, the variety ciliolata in Siskiyou County, California, and the variety californica in the mountains of California and Nevada at an elevation of from about 7500 to 12000 feet."

The drawing of Cassiope mertensiana by Jeanne R. Janish is taken with permission from Part 4 of Vascular Plants of the Pacific Northwest by Hitchcock et al.



STATE OFFICERS

DIRECTORS	Jerry Igo, Nancy Fredricks, Paula Brooks, Barbara Mumbdo, Marjorie Willis
PRESIDENT	Sue Garrett
IMMEDIATE PAST PRESIDENT	Dan Luoma
VICED PRESIDENT	Elizabeth Handler
SECRETARY	Rhoda Love
TREASURER	Daphne Stone

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CONSERVATION	Ed Alverson
LEGISLATIVE	Esther McEvoy
MEMBERSHIP	Mary Falconer
WILDFLOWER POSTERS	Susan Gabry
NOTECARDS	Nancy Fredricks

CHAPTER PRESIDENTS

BLUE MOUNTAIN (Pendleton)	Bruce Barnes
CORVALLIS	Wes Messinger
EMERALD (Eugene)	Diane English
HIGH DESERT (Bend)	Marge Ettinger
MID-COLUMBIA	Kelch Chamberlain
NORTH COAST	Sallie Jacobsen
PORTLAND	Esther Kennedy
SISKIYOU	Richard Brock
UMQUIA VALLEY (Roseburg)	Russ Holmes
WILLAMETTE VALLEY (Salem)	Rose Hayden
WM. CUSICK (LaGrande)	Karen Antell

BULLETIN

EDITOR	Bryan Boyce
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Please send change of address requests to the membership chairperson, Mary Falconer, address above.

GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Camera-ready copy is easiest, but no submission will be rejected if it is not. Copy should be in 3.5 in. wide columns, of any length, with spacing between columns of .2 in. The *Bulletin* uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article posted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh or

IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings are preferred to pictures requiring halftone reproduction. Contact the editor about our current needs.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, whether a by-line is desired. Include instructions as to whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., where appropriate. Use of both scientific and common names is encouraged. Italicize genus and species (underline if italic is not available). **Return of Originals:** Submissions will not be returned unless expressly requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (including old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____	Chapter (if known) _____
Address _____	Is this a change of address? _____
	If so, please write your Old Address here: _____
City _____ State _____ Zip+4 _____	
Phone (Home) _____ (Work) _____	City _____ State _____ Zip _____

* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

<input type="checkbox"/> New	<input type="checkbox"/> Renewal	<input type="checkbox"/> Quarter Membership (Sep.-Dec.) \$3.00	<input type="checkbox"/> <i>Bulletin</i> Subscription only \$12.00	
<input type="checkbox"/> Student.....		\$ 8.00	<input type="checkbox"/> Sustaining.....	\$ 30.00
<input type="checkbox"/> Regular.....		12.00	<input type="checkbox"/> Patron.....	100.00
<input type="checkbox"/> Family Membership.....		18.00	<input type="checkbox"/> Life Member.....	500.00

* CONTRIBUTIONS:	Jean Davis Memorial Award Fund	\$ _____
	Leighton Ho Memorial Award Fund	\$ _____
	Rare and Endangered Plant Fund	\$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Avenue NW, Salem, Oregon 97304.

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Please send change of address notices to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Avenue NW; Salem, Oregon 97304.

Native Plant Society of Oregon
13285 S. Clackamas River Drive
Oregon City, Or. 97045



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Bulletin of the
NATIVE PLANT SOCIETY OF OREGON

To increase the knowledge of members and public in identification
and conservation of the native plants of the Pacific Northwest

VOLUME 23 NUMBER 2

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips will take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public.

Blue Mountain

26 Feb., Mon.

MEETING. 7:30pm, Room 130, Morrow Hall, Blue Mountain Community College. Program to be announced. Call if you have any questions. Contact Bruce Barnes (H-276-5547; O-278-2222).

Corvallis

12 Feb., Mon.

MEETING. 7:30pm in Room 4083, Cordley Hall, OSU, Corvallis. The subject will be Dr. Richard Hampton's work on native hops.

Emerald

For information, contact Diane English (484-9287).

High Desert

For information, contact Marge Ettinger (382-2255).

Mid-Columbia

7 Feb., Wed.

MEETING. 7:30pm at the Mosier School. Susan and Jerry Gabay will present a slide program featuring "The Floral Highlights of Mt. Rainier".

North Coast

1 Feb., Thurs.

MEETING. 7pm at State Office Building, 3600 3rd St., Tillamook. Ray Westermeyer, MD, will show slides and tell us about the wonderful plants and birds he saw in Africa. He and his family spent a year serving at a hospital in Zambia recently.

24 Feb., Sat. **FIELD TRIP.** Leave at 10:00am from the SW corner of the Cornet parking lot. Travel to the Nehalem Bay Tidal Flats to see a natural cell of dunes.

Portland

17 Feb., Sat. **POTLUCK LUNCHEON.** To be served at 12:30pm at Leach Botanical Gardens, 6704 SE 122nd ave., Portland (2 blocks south of Foster Road). Bring your choice of a hot dish, salad or dessert to serve six. Please bring your own dishes and silverware. Beverages and rolls will be furnished. Reservations are not required but would be appreciated. There will be a meeting about the Annual Flower Show right after the potluck. Do attend--your assistance is needed! For more information about the potluck, call Elizabeth Handler (244-5320).

13 Feb., Tue. **MEETING.** 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Mike Fahey will talk and show slides on two historic personages--Mary Delaney, noted for her flower collages, and Margaret Mee, who drew flowers while exploring the Amazon jungles.

3 Feb., Sat. **WORKSHOP.** Meet at 10am at First United Methodist Church, 1838 SW Jefferson, Portland. Study "Ethics of Plant Collection and Herb Usage" and present market conditions with Krista Thie.

10 Feb., Sat. **WORKSHOP.** Meet at 10am at First United Methodist Church, 1838 SW Jefferson, Portland. Study "Crucifers and Carophylls: Their Natural History and Taxonomy", with Dr. A. R. Kruckeberg.

Siskiyou

8 Feb., Thurs. **Meeting.** 7:30pm at Rm. 118, Science Bldg., Southern Oregon State College. Naomi Neyerlin on Umpqua National Forest rare plants (including the new species of *Calochortus*) in a two screen slide presentation.

Umpqua Valley

15 Feb., Thurs. **MEETING.** 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Slide presentation by Jack Hausotter on "World of the Lichen".

24 Feb., Sat. **FIELD TRIP.** "World of the Lichen". Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. A lichenologist will identify and discuss the lichen we find on trees, shrubs and rocks. Exact location of the trip to be announced. Leader: Clayton Fraser, Lichenologist. For more info call Jack Hausotter (874-2462).

15 Mar., Thurs. **MEETING.** 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Nancy Fredricks will speak on research she has conducted on *Calochortus umpquaensis* and *Calochortus coxi*.

Willamette Valley

19 Feb., Mon. **MEETING.** 7pm at First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State Street). Ed Alvorson, Corvallis chapter member, will present a program entitled "Adventures with Willamette Valley Grasslands: Identification and Restoration of Remnant Examples".

William Cusick

For information, contact Karen Antell (963-0267).

BITS AND PIECES

---News and Information From All Over

9 TH ANNUAL WILD OREGON AUCTIONS

This is The Oregon Natural Resources Council's major yearly fundraiser--an auction of items donated by people committed to the protection of Oregon's natural resources. Many contributions will have some connection to the outdoors.

The first auction will be at The Wheeler Pavilion of the Lane County Convention Center in Eugene on March 31st; the second on April 7th at The Old Church in Portland. Both are on Saturday at 6:30 pm. Contact ONRC in Eugene (344-0675) or Portland (223-9001) for more information.

The Siuslaw National Forest is looking for a botanically minded person to perform surveys of Threatened, Endangered and Sensitive Plants in proposed timber harvest units in the Coast Range. The position starts April 23rd, 1990. It will run through September, or longer if more funds are located. The job is being listed as a GS 5/7 Biological Technician, instead of as for a professional botanist. The Forest Service thinks this will allow a wider range of individuals to apply for the position.

Find more information on applying for this position at the State Employment Office or the Siuslaw National Forest Personnel Office at 4077 Research Way, Corvallis, Or., 97333 (750-7034). More information on the job itself is available from Rick Breckel or Delanne Ferguson at the Alsea Ranger District, 503-487-5811.

Oregon has 141 plants listed or candidates for listing under the Federal Endangered Species Act. This is more than any state except Hawaii, California, Florida or Texas. Only 3 of these 141 have actually been listed! Nationally, over 2000 types of plants are candidates for listing, and 221 have actually made it through the listing process. 2% of Oregon's rarest plants have been listed as threatened or endangered, far below the nationwide average of 10%.

The US Fish and Wildlife Service is responsible for placing R&E plants on the Federal list. However, funding for this, disbursed by the Executive branch, has been kept below the levels authorized by the Endangered Species Act. All the Federal agencies seem to follow the same pattern--inadequate funds budgeted for carrying out their legal and ethical responsibilities to protect our natural botanical resources. Nationwide, for instance, BLM has only 16 botanists distributed between its 56 regions. Oregon accounts for a large portion of these due to gentle activism on the part of NPSO. Yet events have shown that this comparatively high level of staffing is inadequate for the task at hand. 44% of all BLM timber sales in Western Oregon in the past 5 years took place without surveys for rare and endangered plants before logging took place. Further checking shows that many of the surveys which did take place were inadequate or simply ignored. One wonders about other parts of the country where BLM has no trained botanists at all.

- * The BLM needs letters encouraging them to up hiring of competent botanists to levels sufficient to accomplishing the job at hand--full surveying of all timber sales and other land use changes in accordance with the Endangered Species Act.

- * US FWS director John Turner needs letters about the importance of conserving our native plants--and getting full budgeting to do so.

- * Your congressmen need letters asking for full funding for the USFWS under the Endangered Species Act.

- * The Forest Service was required to report its 1989 plant conservation efforts. You can call or write the endangered species coordinator to obtain copies of these reports for specific national forests or regions. Congress has been persuaded to earmark funds in the Forest Service budget for plant conservation activities. Funding increased 4 fold in one year, and the Forest Service responded--they now have nearly 30 botanists for the 191 million acres they manage. And a little work is beginning to get done!

NPSO 1990 LIST OF CANDIDATES

The Nominating Committee offers the following final list of candidates for the state board and offices. A brief resume is included with each candidate for consideration. Election ballots will be included in the March Bulletin. Submitted by Marjorie Willis, Chair, Nominating Committee.

PRESIDENT

STEPHANIE SCHULZ, Emerald Chapter. Stephanie has been a member of NPSO for seven years, serving as chapter Vice President and R&E Chair for two years and frequently attending state board meetings. She has a bachelors degree from University of Oregon in Landscape Architecture. She recently did volunteer work for The Nature Conservancy on a wetland/rare plant inventory. Stephanie has worked as a BLM seasonal T/E Botanist. One of her main interests is educating the public about appropriate, ethical uses of native plants in landscaping.

VICE PRESIDENT

DAN LUOMA, Corvallis Chapter. Dan served as state President for two years and also as President of his local chapter. He has been the chair of the state Grants & Budget Committee and a Director at Large. Dan recently received his doctorate from the Geography Dept. at Oregon State University. His thesis was on the ecology of truffles in Douglas-fir forests in the western Cascades.

SECRETARY

SUE YAMAMOTO VRILAKAS, Portland Chapter. Sue is one of those rare people who is good at taking minutes. Rare plants have been a special interest of hers for years. She got a bachelors degree in biology from Lewis & Clark College. Sue assisted Jean Siddall in the Rare Plant Project. For the past 8 years she has been Data Manager/ Botanist for The Nature Conservancy.

TREASURER

TOM CHERICK, Portland Chapter. Tom has been a member of NPSO since 1987. He's been interim state Vice President since Elizabeth Handler hurt her leg. He has an Associate Degree in Landscape Management. He did the irrigation system for the landscape project at the State Fairgrounds, assisted Russ Jolley in the Mile Post 68 project and visited Emerald, Corvallis, Willamette Valley, Mid-Columbia and North Coast Chapters.

Tom is eager to learn the art of bookkeeping. **DIANE ENGLISH**, Emerald Chapter. Since the last Bulletin, Diane was nominated by five NPSO members. She and her family have been active members since 1983. She served as president of the her chapter and enjoys learning about native plants. Diane studies biology at the University of Oregon. She has taken classes in bookkeeping and balances her own checkbook religiously.

DIRECTORS AT LARGE

KATHY SCHUTT, Willamette Valley Chapter. Kathy has been active in promoting the understanding and appropriate use of native plants for many years. She did her undergraduate studies in landscape architecture at the University of Wisconsin with Daryl Morrison, who is a giant figure in the midwest in the restoration of native vegetation. She has worked with Oregon State Parks as a designer and master planner on several native planting projects. She is interested in using natives in the State Park system to preserve the regional character of each park. Kathy has been active in the Native Plant Society's Subcommittee on Native Plant Issues since its inception and has worked on such projects as the State Fairgrounds native plant display.

JOHN CHRISTIE, Portland Chapter. John was very active in NPSO before he took a job as Curator of the Herbarium at the Milwaukee Public Museum in Wisconsin. He got a bachelors in Botany from University of Oregon and masters in Botany from University of British Columbia. He worked as a T/E Botanist for Eugene BLM. Currently John works as an ecologist for The Nature Conservancy, doing wetlands surveys and developing a wetlands classification system for Oregon based on plant communities.

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IMPORTANT ANNUAL MEETING INFORMATION

Be sure to fill your gas tank in Pendleton; there are no gas stations within 25 miles of the ranch.

Check-in will be open at the ranch from 5 to 7PM Fri., and 9 to 10AM Sat. Those not arriving until the banquet may check-in at that time. The phone number at the ranch is 503-566-3381, for those who may need to receive messages.

Those who come Friday evening will have a variety of activities to choose from, depending on the interests of those present, including square dancing (with caller), volleyball, swimming, slides of local flora, and snacks.

Bring swim suits if you want to use the hot-spring-fed swimming pool.

No alcohol will be served; you may bring your own if you wish. Banquet dress will be informal.

Rooms vary from 8 double rooms to cabins and rooms which take varied numbers of guests. Up to 16 'made' beds are available, with linens, etc., and the rest require that one bring their own sleeping bag & towels. Be sure to indicate on the form if there is someone you wish to room with.

The Board meeting Sunday will be in the main lodge of the ranch at 9, and will continue until done (2:00?). The board will break at noon to go through the buffet and continue while eating.

FIELD TRIPS: Field trips will depart from the ranch at 10:00AM Saturday and return by 4:30. The Sunday field trip will run from 9:30 to 12:00, and is a shortened version of Saturday's Field Trip C listed below. The lunches for the Saturday field trips will be created yourself from a generous spread of foods.

Saturday field trips B, C and D will be carpooled; all roads are ok for passenger cars. All trips will depart from the main lodge at the ranch.

FIELD TRIP A: Bobsled Ridge/Jim Dandy Creek loop - A fairly strenuous hike of 5 to 6 miles, which starts and ends right at the Bar M Ranch

(no cars needed!). Leader: Jerry Baker.

FIELD TRIP B: From Ruckle Junction to Bald Mountain via State 204 - by cars, with several stops for botanizing. Leader: Karl Urban.

FIELD TRIP C: North Fork Umatilla River trail - easy hike into of the North Fork Umatilla River Wilderness. The trailhead is at the Umatilla Forks Campground, about 3 m. from the ranch. Leaders: Sat.- Bruce Barnes; Sun.- Karl Urban.

FIELD TRIP D: A drive with frequent stops along Ruckle Ridge from Ruckle Junction to Mt. Emily and return west to I-84. Leader: Karen Antell.

Inquiries: Prior to June 8th, phone Bruce Barnes, 276-5547, evenings and weekends.

ACCOMMODATIONS ELSEWHERE IN THE AREA:

CAMPGROUNDS: The Umatilla Forks Campground in the Umatilla National Forest, is just three m. past the ranch entrance, with many campsites. At that date, there may not be running water.

MOTELS IN PENDLETON: (rates as of Nov. 1989)

CHAPARRAL MOTEL, 620 Tutuilla Rd.
(503) 276-8654, \$32.00

ECONO LODGE, 201 SW Court
(503) 276-5252, \$28.00

LET 'ER BUCK MOTEL, 205 SE Dorion
(503) 276-3293, \$20.00

LONGHORN MOTEL, 411 SW Dorion
(503) 276-7531, \$24.00

MOTEL 6, 325 SE Nye
(503) 276-3160, \$22.95

THE PENDLETON INN, 400 SE Nye
(503)-276-2135, \$37.00

THE RANCH MOTEL, I-84 Barnhart Exit 202
(503) 276-4711, \$23.95

RED LION MOTOR INN, 304 SE Nye
(503) 276-6111, \$54.00

TAPADERA MOTOR INN, 105 SE Court
(503) 276-3231, \$35.00

TRAVELODGE MOTEL, 310 SE Dorion
(503) 276-6231, \$31.00

RV PARKS IN PENDLETON:

BROOKE RV and MH COURTS, 5 NE 8th
(503) 276-5353, \$12.00

EMIGRANT TRAILER COURT, 300 SW 22nd St
(503) 276-2482, \$8.00

R.V. PARK, 1500 SE Byers Ave.
(503) 276-5408, \$12.00

RIVERVIEW TERRACE, 2712 NE Riverside
(503) 276-7632, \$10.70

SHADEVIEW R.V. PARK, 1417 SW 37th
(503) 276-0688, \$7.00

STOTLAR MOBILE HOME & RV PK, 15 SE 11th
(503) 276-0734, \$10.00

MILTON-FREEWATER: Another option is Birch Tree Manor, a bed and breakfast inn owned by our member, Pricilla Dauble, at 615 S. Main, Milton-Freewater, 97862, (503) 938-6455.

---Bruce Barnes, Blue Mountain Chapter

THE MOUNT PISGAH ARBORETUM NEEDS YOUR HELP!

Each weekday morning during May, 1990, volunteer guides will lead elementary school children on nature walks at the Arboretum. Two thousand children will visit during this time. *We need additional volunteers!*

Volunteers are needed for various tasks: guiding children on the trails, greeting buses, organizing groups, answering calls and making phone calls.

All volunteers receive free educational materials as well as free natural history training courtesy of the Arboretum. Attending at least one indoor and two outdoor training sessions is required. Sessions focus on life cycles of flora and fauna one might study at the Arboretum. Ecology rather than simple identification is stressed. A variety of nature games for children are also taught to the volunteer. Veteran volunteers will be on hand to share what works for them.

If you have further questions about the program, call our Education Coordinator, Sue Wineland at 345-3253 or 747-4501 (ext. 2446). Any time you can contribute will be well appreciated.



Candidates---continued from p. 16

TOM KAYE, Corvallis Chapter. Tom, a past President of the Corvallis chapter, currently serves as chapter Treasurer. His B.S. was in Environmental Sciences from Evergreen State College, and he recently got his M.S. in Botany from OSU. His thesis was on the ecology of the Olympic milk vetch. Tom was an intern for the Natural Heritage Program and a seasonal botanist with the Olympic National Park for four years. He is

currently a Botanist with the state Dept. of Agriculture's Endangered Species Program.

PAUL LEMON, Siskiyou Chapter. Paul's expertise is in forest and range ecology and fire ecology. He got his Ph.D. in Plant Ecology from University of Minnesota in 1943 and worked as professor of ecology, botany, etc. for about 27 years at State University of New York. Since then, Paul taught college classes in western Africa and Southern Oregon State College, along with other endeavors.

RARE PLANT FIELD REPORT II.
ERIOGONUM CROSBYAE & E.
PROCIDUUM

As students of a somewhat less than popular discipline, and longtime fans of natural history, we have faced the ghastly stares, and answered the chorus of "Botany? but what are you going to do with it?" with the calm reply: "why, botany, of course." We were thus perhaps justified in our delight at the prospect, afforded by our employment with the state's endangered species program, of tramping through Oregon's high desert for a summer.

With Tom Kaye, we engaged in research projects on several plant species and quite a number of local eateries, including Senecio ertterae (discussed in Tom's December "Bulletin" article) and the Duck Inn (wherein lies a tale best left untold).

One of the projects to which we were assigned concerned two wild buckwheat species: Eriogonum prociduum and E. crosbyae (Polygonaceae). Both species in Oregon exist in few and isolated populations (only three for E. crosbyae and five for E. prociduum), although they are slightly more well-represented farther south.

This work fell into two parts: surveying for further populations of both species, and assessing the possibility that they were hybridizing at some point in their range. The surveying was what you might call big fun. Since both plants occur on distinctive substrates, we got out the aerial photographs

that the Lakeview BLM has of the whole district. We could see where the known populations were so we spent a day marking similar spots on our treasure trove of topo maps, jumped in the truck and drove there.

E. crosbyae, as we understood it, is confined to a hydrothermally altered tuff sandstone. Outcrops of this rock are white, and very little grows on them, so they are visible for quite a distance. The formations, eroded from the surrounding sagebrush steppe, show very little soil development, and are rich in arsenic and other nasty heavy metal compounds. (The cyanide leach gold mining taking place on Nevada E. crosbyae sites is no coincidence: the same ancient hot waters deposited all these minerals.) The combination of exposure, drought due to lack of soil accumulation, and poisonous metals (which make these tuffs so inimical to plant life in general) fail to extinguish our tenacious, tough-as-nails little buckwheat.

Lakeview BLM is a big district, and full of ravenous ticks. We spent the better part of three weeks bouncing over the back road ruts of the high plains in a variety of less-than-adequate and utterly forgettable vehicles. After hiking for miles in frenzied anticipation, we reached our first survey site with the full expectation that our little plant would be there. It was not. Maybe over the next hill... Time after time our hopes were dashed. Our frustration mounted. Why

isn't it here? It should be, after all. The place looks right, it feels right, what's wrong with it? What's wrong with us? Finally, in a haze of sweat and botanical faith, we stumbled across our last bit of glaring white tuff. We found not a single new population of Eriogonum crosbyae.

We did, however, (or Tom did, really) find one new sub-population of our second target species, E. prociduum. On a fine July day, high on the Crane Mountain Front (above the town of Lakeview), we split up among the woods and meadows to search. Some of our favorites among the plants we found in bloom were Allium platycaule, Clarkia rhomboidea, Dimeresia howellii, Trifolium cyathiferum, Orthocarpus purperascens, Astragalus whitneyi, Arnica cordifolia, Arenaria congesta.

Determining whether these two erstwhile species of Eriogonum were hybridizing, as was suggested by some morphological intermediates which had been reported, required further study. One way of assessing genetic variability is by using marker proteins expected to be consistent within a species. The proteins are separated by the process of electrophoresis in a way that allows comparisons between individuals. The proteins of hybrids appear as intermediates between those of the two parent species.

Our part in the electrophoretic study was to collect tissue samples and

transport them on ice back to Salem, no mean task in south-east Oregon's blazing summer. We collected a score of samples from each of several populations of each species. We approached our collecting, which included small voucher specimens as well as the tissue samples of young leaves necessary for analysis, with a measure of sympathy, and not without some guilt. We overcame these feelings with the glee that always accompanies the possibility of shedding light on questions botanical.

We visited all the Oregon populations of both species, and one E. crosbyae site in Nevada (on an active gold claim). Our suspicions grew that we were dealing with a case of taxonomic disarray. The few morphologic generalizations that separated the two species were not consistent. The habit of E. crosbyae was professed to be tightly caespitose, lower to the ground than E. prociduum, and with more pubescent scapes. We found examples of some of these traits in both species. In addition, the E. crosbyae plants at Bell Springs Nevada had a loose rangy structure and were far larger than any we had seen.

The results of the electrophoresis were not really a surprise. Our growing conviction that E. prociduum and E. crosbyae were not as distinct as most species was supported by the lack of consistent marker proteins in either species. What about the search for hybrids? Since no protein alleles were shared by all members of either

species, it was impossible to determine if hybrid intermediates exist. The fact that morphologic and genetic variability within the populations was high was striking, and somewhat unexpected in isolated colonies of a rare plant.

While perhaps frustrating to the workers involved, these kinds of results are typical of the progress of rare plant research. The absence of new populations of Eriogonum emphasizes their sensitivity and strengthens the need to protect the extant colonies from threats such as grazing and mining.

STATUS SUMMARY

Eriogonum crosbyae

Number of populations in Oregon: three
Population trends: unknown
Annual or Perennial: Perennial
Land ownership: federal and state
Federal Status: C2 Candidate
State Status: Candidate for listing
Natural Heritage Program Status: Threatened

Eriogonum prociduum

Number of populations in Oregon: five
Population trends: unknown
Annual or Perennial: Perennial
Land ownership: Federal, State and private
Federal Status: C2 Candidate
State Status: Candidate for listing
Natural Heritage Program Status: Threatened

Wes Messinger
Susan Massey



Eriogonum crosbyae, drawing by J.R. Janish, from Reveal, 1981 in Brittonia 33:441-444.

HELP SAVE OREGON'S REDWOODS

I love redwoods. As a long-time botanist, a teacher and a member of the Native Plant Society of Oregon, I am proud to stand up for one of the oldest, largest, most beautiful and most unique plants in the world.

Our gorgeous coast redwood, Sequoia sempervirens, is the only surviving member of its genus. The redwoods came to prominence in a very different world, in Jurassic times, over 2 hundred million years ago. Members of the redwood family were a dominant part of the earth's flora when dinosaurs roamed the land. In the mid-Tertiary, 40 million years ago, the genus Sequoia was widespread in the northern hemisphere. Sequoia fossils have been found across the United States, in Europe and Asia.

Due to gradual changes in the earth's climate, however, the genus slowly gave ground throughout the world until a single species was able to hang on in only one small area. That area, of course, is along the coast of northern California and southern Oregon. The genus Sequoia survives nowhere else in the world. When you enter a redwood forest, you go back in time hundreds of millions of years. When Europeans came to the Pacific coast, there were perhaps 3 to 4 million acres of sequoia forests. By any scale, the species is what botanists call a narrow endemic; unfortunately this fact has not protected it from exploitation.

Sequoia sempervirens is one of the largest, and most beautiful trees in the world. It is the tallest tree on earth. Old individuals can reach a height of 360 feet. And coast redwoods regularly reach 20 feet in diameter; that's over 60 feet around! Visitors from other parts of the US and the world are frequently struck dumb by admiration when gazing up at one of these magnificent trees. And redwoods produce their own community of other plants and animals which live in, under and around the trees.

Despite the sequoia's beauty, magnificent size, its global rarity and the struggle the species was already waging against climatic change, loggers began, at the end of the last century, to attack our redwood forests, first with axes and later with chain saws. Today only 4% of the world's sequoias remain. In California, something over 100,000 acres of redwoods are protected in parks, but in Oregon we have only 1,450 acres of redwoods left. Although these trees are on National Forest land, they are not protected. Oregon has no national or state redwoods parks. And now some of Oregon's last remaining redwoods, in the Siskiyou National Forest, are threatened with being included in the 310 million board feet of lumber mandated to be cut in that forest by Senator Hatfield's 1989 compromise forest legislation.

I wonder if the reader is aware that Oregon has already lost all of her coastal riparian redwood forests. The sequoias that remain in the Siskiyou National Forest are in the Coast Range in the upper Chetko River drainage. When all the easy-to-reach redwoods on Oregon's coastal river plains were logged, we also lost unique plant and animal communities that will never return. Oregon botanists mourn the extinction in our state of the beautiful Clintonia andrewsiana, a stunning bright red lily, hummingbird pollinated, that grew in that coastal redwood forest. This flower no longer grows in Oregon and other plants and animals have been lost as well.

Some non-botanists may not realize that Oregon's redwoods represent a unique genetic resource. The Chetko redwoods are the sequoias that grow at the most northerly extreme of the tree's range. If the earth is subjected to increased global warming due to greenhouse gases, it could happen that only the more northerly populations of many California species, including Sequoia sempervirens, will have the proper genetic makeup to survive. If Oregon's redwoods are logged, the entire species could be doomed to extinction despite those trees protected in parks further south.

I sincerely hope we are not too late to save Oregon's remaining redwoods. I hope you agree with me that no redwoods should ever again be cut for lumber in our state. Please join me in making our voices heard not only in Oregon but across the United States. After all, plants and animals in the National Forests belong to all Americans. Please write to the individuals listed below and protest the current plans to cut Oregon redwoods. Please write also to your friends and relatives in other parts of the U. S. and ask them to protest to their federal senators and congresspersons. Don't hesitate to write to President George Bush. If he wishes to be the environmental president, what better way for him to start than to save the world's most remarkable trees? Write to: Ronald J. McCormick, Forest Supervisor, Siskiyou National Forest, 200 NE Greenfield Rd., PO Box 440, Grants Pass, Oregon 97526-0242. Send copies of your letter to The Honorable Mark O. Hatfield, and the Honorable Robert Packwood, United States Senate, Washington DC 20510. Ask for replies. Please help to save the last of one of our planet's most magnificent species.

Rhoda Love,
State Secretary

STATE OFFICERS

DIRECTORS	Jerry Igo, Nancy Fredricks, Paula Brooks, Barbara Mumbo, Marjorie Willis
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RARE AND ENDANGERED	Jean Siddall	535 Atwater Rd., Lake Oswego 97034; 636-4633
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WILDELOWER POSTERS	Susan Gabay	P. O. Box 151, Mosier 97040; 478-3576
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CHAPTER PRESIDENTS

BLUE MOUNTAIN (Pendleton)	Bruce Barnes	731 NW 5th, Pendleton 97801; 276-5547
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PORTLAND	Esther Kennedy	6124 NE 28th Ave., Portland 97211; 287-3091
SISKIYOU	Richard Brock	540 Oak St., Ashland 97520; 493-4111
UMPUQUA VALLEY (Roseburg)	Russ Holmes	322 Arcadia Drive, Roseburg 97470; 672-4635
WILLAMETTE VALLEY (Salem)	Rose Hayden	4455 Shoreline Dr. N, Keizer 97303; (w)378-8486 (h)390-4004
WM. CUSICK (LaGrande)	Rose Anzell	Biology Dept., EOSC, LaGrande 97850; 963-0267

EDITOR: Bryan Boyce 13285 S. Clackamas River, Oregon City 97045-9411; 655-4457

BULLETIN

GUIDELINES FOR CONTRIBUTORS

The NPSO Bulletin is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Camera-ready copy is easiest, but no submission will be rejected if it is not. Copy should be in 3.5 in. wide columns, of any length, with spacing between columns of .2 in. The Bulletin uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article posted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings are preferred to pictures requiring halftone reproduction. Contact the editor about our current needs.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, whether a by-line is desired. Include instructions as to whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Names: Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., where appropriate. Use of both scientific and common names is encouraged. Italicize genus and species (underline if italic is not available).

Submissions: will not be returned unless expressly requested.

Membership: in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (including old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____	Chapter (if known) _____
Address _____	Is this a change of address? _____
City _____ State _____ Zip+4 _____	If so, please write your Old Address here: _____
Phone (Home) _____ (Work) _____	City _____ State _____ Zip _____

* **DUES** include monthly NPSO Bulletin. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () Bulletin Subscription only \$12.00

() Student	\$ 8.00	() Sustaining	\$ 30.00
() Regular	12.00	() Patron	100.00
() Family Membership	18.00	() Life Member	500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund	\$ _____
Leighton Ho Memorial Award Fund	\$ _____
Rare and Endangered Plant Fund	\$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Avenue NW, Salem, Oregon 97304.

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Send change of address notices to:
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Mary Falconer, Membership Chair,
1920 Engel Court NW,
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To increase the knowledge of members and public in identification and conservation of the native plants of the Pacific Northwest

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness areas must be no larger than 12.

Blue Mountain

26 Mar., Mon.

MEETING. 7:30pm, Room 130, Morrow Hall, Blue Mountain Community College. Program to be announced. Call if you have any questions. Contact Bruce Barnes (H-276-5547; O-278-2222).

Corvallis

12 Mar., Mon.

MEETING. 7:30pm in Room 4083, Cordley Hall, OSU, Corvallis.

Emerald

For information, contact Diane English (484-9287).

High Desert

21 Apr., Sat.

FIELD TRIP. Leave at 8:30am sharp from behind the McDonalds at 4048 NE 3rd St., Bend. The Island RNA in Cove Palisades State Park features pristine essentially ungrazed meadow-steppe communities. Expect a rough, steep trail and possibly rattlesnakes. Geologist Larry Chitwood will add his expertise. Leader: Stu Garrett (389-6981 eves or 382-2811 days).

Mid-Columbia

7 Mar., Wed.

MEETING. 7:30pm at the Mosier School. Dick VanderSchaff of The Nature Conservancy will discuss representative plant communities and botanically significant natural areas on the Oregon side of the Columbia River Gorge National Scenic Area.

North Coast

1 Mar., Thurs.

MEETING. 7pm at State Office Building, 3600 3rd St., Tillamook. Edward Stiernberg speaks about his work on pollen analysis.

25 Mar., Sun.

FIELD TRIP. Leave at 12:30pm from the community college at 2510 1st St., Tillamook. Destination is Gold Peak.

25 Mar., Sun.

FIELD TRIP. Leave at 9:30am from the SW corner of the Cornet parking lot. Destination is Tillamook Head. Bring lunch and water. Contact: Sallie Jacobsen (842-4350).

Portland

13 Mar., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Glenn Walshall will present a slide program on the flora and amenities of hiking the west side of Mt. Hood.

"WELCOME TO THE 1999 FIELD TRIP SEASON." Each of the first four field trips involve no more than three miles RT hiking distance, and less than 400 ft. elevation gain. Please dress appropriately for any kind of weather, including boots. Bring a sack lunch, hot beverage, water, and handlens and notebook. For specific information call the field trip leader.

17 Mar., Sat.

FIELD TRIP to Catherine Creek in the Columbia River Gorge, with the Willamette Valley Chapter. Leave from Lewis & Clark State Park (exit 18 off I-84 heading east) at 9am. Second meeting point--at 10 am Bingen Winery on Highway SR14. Distance from Portland about 120 miles. Leaders: Dave and Jan Dobak (248-9242).

24 Mar., Sat.

FIELD TRIP to Rowena Plateau. Leave from Lewis & Clark State Park (exit 18 off I-84 heading east) at 9am. Leader: Maxine Wilson (655-1523).

31 Mar., Sat.

FIELD TRIP to Home Valley and Wind Mountain for mosses and lichens. Leave from Gateway Max Park and Ride at 8:30am, or from Home Valley Park, off SR14 at 9:30am. Bring hand lens and notebook. Leaders: John Davis (1-509-427-5871) or Elizabeth Handler (244-5320).

7 Apr., Sat.

FIELD TRIP to Columbia Hills, by a new route east of Lyle. Leave at 8am from Gateway Max Park and Ride or 9am from the Bingen Winery on Highway SR14. Leader: Elizabeth Handler (244-5320).

Siskiyou

8 Mar., Thurs.

Meeting. 7:30pm at Rm. 171, Science Bldg, Southern Oregon State College. Paul Lemon, Adjunct Professor at SOSOC, will show slides on geography, evolution, diversity & uses of palms of the world.

Umpqua Valley

15 Mar., Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Nancy Fredricks will speak on research she has conducted on *Calochortus umpquensis* and *Calochortus coxii*.

17 Mar., Sat.

FIELD TRIP. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. Early spring flowers on conglomerate bluffs in the Canyonville fault zone. Info: Jack Hausotter (874-2462).

7 Apr., Sat.

FIELD TRIP. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. Spring flowers on the high basalt mesa of Table Rock north of Medford. Contact: Jack Hausotter (874-2462).

19 Apr., Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Bob Meinke will speak on the State Endangered Species Program.

Willamette Valley

If you want to hear about unscheduled mid-week trips to places near or far, call Clint Urey (581-1805).

- 19 Mar., Mon. **MEETING.** 7pm at First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State Street). Larry Tuttle of The Wilderness Society will speak on "The Ecology of Old Growth Forests".
- 17 Mar., Sat. **FIELD TRIP.** Leave at 9am from Lewis & Clark State Park just off I-84 east of Fairview. Visit Catherine Creek with the Portland Chapter. For carpools from Salem, call Clint Urey (581-1805).
- 24 Mar., Sat. **FIELD TRIP.** Leave at 8am from South Salem K-Mart. Moss Identification Workshop at Silver Falls State Park. Head outdoors first to gather specimens, then a study session in the Lodge. Bring a sack lunch and a hand lens if possible. Leader: Edna Stevenson (743-2249).
- 21 Apr., Sat. **FIELD TRIP.** Leave at 8:30am from South Salem K-Mart. Visit Baskett Slough and nearby areas. Leader: Vi Sobolik (623-2630--Dallas).

William Cusick

For information, contact Karen Antell (963-0267).

BITS AND PIECES

---News and Information From All Over

EARTH DAY OAK WOODLAND MOUNTAINTOP CAMPOUT AND RETREAT. This event features wildflower hikes with a botanist/herbalist, shared food in a wood-heated cabin, and camping under the oaks with views of Mt. Hood and the White Salmon River Valley. There is a limit of 8 guests. \$25 before Apr. 11, and \$35 after. Apr. 21-22, 1990, starting 11 am Sat. Call or write Krista Thie for details at 1549 W. Jewett Blvd., White Salmon, Wa. 98672 (509-493-2626).

GLIDE WILDFLOWER SHOW. The 26th annual Glide Wildflower Show is scheduled for April 28th and 29th in the Glide Community Building in Glide, Oregon. The show always provides a beautiful display of the local flora along with a variety of colorful photos. More details will appear in the April *Bulletin*.

A **NATURALIST** will be available at The Nature Conservancy's Tom McCall Preserve weekends March 17 through May 20, 11am to 4 pm. More information on TNC activities this spring at Tom McCall will be available in next month's *Bulletin*.

DESERT CONFERENCE XII RETURNS TO MALHEUR.

The annual Desert Conference will be held May 4-6 1990 at the Malheur Field Station. A variety of field trips, expert presentations, panels and workshops will be offered. Trips are planned to possible Wilderness and other special areas, including rare botanical communities and birding hot spots. Issues to be discussed include cyanide leach mining, military withdrawals of public lands, grazing, proposals for protecting threatened wildlands, photography and writing.

Room and board will be at low cost, but preregistration is required. For more information and forms contact:

Desert Conference XII

POB 732,

Mountain Home Idaho 83647.

BEAUTIFICATION PROJECT. The Roseburg Jaycees, the NPSO, and the Roseburg Parks Dept. are cooperating on a planting project in a city park and along bikepaths. Some native species are being used, with donations coming from local nurseries. Anyone wishing to take part can call Patty or Dave Turcotte eves at 672-0874. Workers are slated to start out at 9am from the Jaycee Clubhouse in Stewart Park.

THE PRESIDENT'S COLUMN

A PERSONAL VISION FOR THE YEAR 2000

The following is what I imagine the NPSO President's report in the year 2000 might look like.

As we enter the new milenium, I am drawn to a retrospective of the Society's last decade. It is a positive view and I am anxious to share it with you. Over the decaed many local and global forces have affected the fortunes of NPSO. I will try to record and interpret most of them.

The most important impacts were the effects from changes in global environmental awareness and in macro-economics. The political changes started by Gorbachev in the late '80's led to drastic decreases in defense budgets. In an era of increasing environmental awareness, this led to significant increases in agency resources for rare plants and habitat preservation and rehabilitation. After years of increasing oil imports, it was the three large oil spills in the harbors of San Diego, Seattle, and Boston in '91 and '92 that galvanized public concern. These factors contributed to Robert Redford's surprise victory over Dan Quayle in the 1996 election. Redford's subsequent strong support for conservation initiatives here and abroad has given momentum to the issue worldwide. The riding power of the Green Party in the US and abroad has also influenced national politics. The heartbreak of watching the Eastern European countries deal with decades of environmental neglect has taught the World a lesson.

In the mid-'90's it became apparent that global warming was here to stay and had arrived sooner than expected. This was shown by the loss of the Oregon Pumice Grapefern (*Botrychium pumicola*), a pleistocene paleo-endemic that grew only at relict sites in the Cascades. Oregon's timber industry reeled, as timber supplies ran out. Biodiversity in the forest had not been maintained. Entire monoculture plantations became bonsai gardens as Nature was unable to select more suitable genetic stock to survive the rapidly changing conditions. As the timber industry waned in importance, Oregon

realized that the conservationism of the 70's and 80's wasn't responsible for the industry's decline. Inattention to sustained-yield harvesting and biologically appropriate timber practices were perceived as the true culprits.

Joining the Environmental Federation of Oregon provided the funds for the NPSO to hire our first part-time director. We were fortunate that Julie Kierstead returned from California in '92 to take the position. Initial grants for education and science programs led to foundation and corporate support. Within 2 years Julie was full time and we were self-supporting. Membership rose to our present level of 3500. The NPSO has received regional recognition for its education programs. These concentrate on showing high school science students the importance of plant ecology and conservation. Our program of field trips and other programs has continued and broadened this educational mission. We joined in initiating the National Council of Native Plant Societies and NPSO past-President Rhoda Love was its first chair.

In retrospect, our dealings with the mining industry were some of our most effective. With gold at \$600 an ounce, Oregon now has 17 mines utilizing cyanide leach technology, producing a total of \$230 million of gold a year. NPSO worked with the companies to site mines and mitigate impacts on the rare plants found at most of the mine sites. NPSO held the second West Coast Rare Plant Conference in Eugene in 1993, giving us national prominence. It led to our best-selling publication: "*Preserving Rarity and Biodiversity in Northwestern America*". Our expanded poster, card and other sales items not only gave us greater visibility, they added to our treasury and allowed expansion of our R&E preservation efforts. The strengthening of the The Endangered Species Act in 1997 gave impetus to our attempts to preserve elements of Oregon's biodiversity. We cooperated with the Nature Conservancy in several preserves statewide.

Grazing pressure on BLM lands was substantially reduced. Streams in Eastern Oregon that had not run in 100 years became quality trout fisheries. Steens Mountain National Park highlighted the ice-age relict plants that grow there. Our monthly scientific journal "Kalmiopsis" has been recognized nationally for its high quality research and review articles. Editor Frank Lang has received two national awards for his work.

The past decade has been good for the Society. I can only hope and expect that by 2010 we will build on the efforts reported here.

Cornus canadensis
drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist
University of Washington Press



ON THE STUDY OF BOTANICAL HISTORY

In a recently published account of the history of botanical exploration of the old Oregon Territory I have noted some of the gaps and gulfs in our knowledge of the early field collectors (NPSO Bulletin V. 22 no. 5, May '89). Also I find conflicting views of the extent of travel by some field naturalists into the Pacific states. Which already published itineraries of plant explorers within the Pacific states are uncertain or open to question? Perhaps the best that the student/ historian can do is read the references, keep an inquiring mind and avoid publication of unsupported assumptions. Below are some convincing reference sources used in my studies about naturalists in the Pacific states, with some summaries of their contents and values to the critical reader.

1. Hunter Dupree, *Asa Gray, 1810-1888*. Harvard Univ. Press, 1959.
2. Joseph Ewan, *Rocky Mountain Naturalists*. Denver Univ. Press, 1950. Many brief biographies of naturalists of the Rockies and Pacific states from the earliest to some still alive at publication. A major reference useful to distinguish California botanists who didn't reach Oregon Terr.
3. Janet E. Graustein, *Thomas Nuttall*. Harvard Univ. Press, 1967. A major collector in Ore, Calif. & Hawaii.

4. Jane L. Gray, ed., *Letters of Asa Gray*. 2 vol., Houghton-Mifflin Co., 1973. Reprint of the 1894 exhaustive biography.
5. T. Howell, *Flora of Northwest America*. vol. 1, self-published, Portland, 1901.
6. H.B. Humphrey, *Makers of North American Botany*. Ronald Press, 1961.
7. Alice L. Kibbe, Phd., ed., *Afield with Plant Lovers and Collectors*. Self-published, Carthage, Ill. 1953. The letters of an Illinois printer who specialized in herbarium labels. Covers such western travelers as A. Gray, E.L. Greene, C.C. Parry and C.G. Pringle.
8. Susan McKelvey, *Botanical Exploration of the Trans-Mississippi West, 1790-1850*. Harvard Univ. Press, 1955. Maps of exploration by decades with journal quotes. Valuable indices.
9. Bassett Maguire, *Highlights of Botanical Exploration in the New World*. Article 13 in *Fifty Years of Botany*, McGraw-Hill, 1958.
10. A. D. Rodgers, *American Botany, 1873-1892*. Princeton Univ. Press, 1944.
11. *Botanical Explorations in Washington, Oregon, and California*. In *Huntia*, 3:5-62, 1969. A valuable list of references.

Edward P. Thatcher
Professor Emeritus, UO

VOTE ON NAMING THE NEW NPSO JOURNAL

The NPSO State Board decided at its Jan. meeting to refer naming the upcoming 'Occasional Journal' to a vote by the membership. The new journal was envisioned last year by Pres. Stu Garrett, and the State Board approved moving forward with it. Last Decem-ber's *Bulletin* contained an announcement about the journal and offered a prize of Arno's *North-west Trees* for the winning name suggestion. We have received many suggestions and are putting them before the membership for a vote. Please find your ballot enclosed in this issue, combined with ballots for State Board positions, and send us your votes for both to the same address!

Several general criteria for name selection have been suggested. Many wish to use the botanical name of some native species. Others wish to honor early botanists. Often these both can be done with one name. Others feel that some reference to our geographical area should be important. Some wish to use the name of an Oregon endemic species, which grows only within the state. Others feel the need to find some species more indicative of the entire state. Narrow endemics seem to grow only in a small portion of the state, while types that are widespread in the state also grow throughout the west. Others wish to honor a plant's beauty or other values for man. The *sound* of the name was often named an important feature. Following is an alphabetical listing of the 14 suggestions we received, with some of the reasoning given for selecting that name.

CALYPSO. This dainty and beautiful orchid is a favorite flower for many. It is associated with older conifer forests at many elevations.

CAMASSIA. This showy bulb can cover large areas with blue and was a major Indian food.

CASCADIA. This name has been used previously primarily in geology for the entire Cascade Mountain region, including the area from the Coast into Idaho and from Northern California into BC. It is certainly an attractive name.

CORNUS. This showy tree is prized for its large blossoms. It colors well in the fall, and has an attractive form. The fruit are used by birds and the bark contains a quinine-like drug.

CORYLUS. Oregon boasts one native species in this genus and is America's main source of the nuts produced by its Eurasian cousin.

CUSICKIA. This honors an important early collector, and several plants named after him. This is no longer a valid genus name, sharing this dubious honor with *Osmaronia*.

FRITILLARIA. Oregon has several species in this genus, all of them attractive and suitable for use in artwork. The name has a nice ring.

HOWELLIA. This honors one of Oregon's early botanists. More than one Federal candidate species bears this name.

KALMIOPSIS. This monotypic shrub grows only in Oregon, and is a candidate for Federal listing. It is an attractive plant that will lend itself to use in logos or artwork. It is one of the few native plants named after a woman.

MAHONIA. This is our state flower and a popular garden shrub. It is used as one of our logos, appearing on the front page of each *Bulletin*.

NUTTALL'S. This honors another early botanist, and the many plants that bear his name.

OREGANA. This name uses the latinized form of our state's name. The region covered is clear.

OSMARONIA. This means 'fragrant' in Greek. The osoberry grows only in the Northwest and has no close relatives elsewhere. The name *Osmaronia* is now discarded, and naming our journal so would rescue it from obscurity.

PISTIL AND STAMEN. Using a little sex appeal, this name emphasizes the floral subjects of the journal.

1990 EMERALD PLANT DBASE

Recently, some NPSOers got a mysterious flier in the mail from an outfit calling itself the Emerald Plant dBase. Here's the story: it all began last Nov. with a few plant lists collected for personal use from long-term NPSO members. The idea was to simplify life by reducing things to just those species really found in my area. Soon, I found comparing nearby sites wasn't that easy with so many alphabetizing schemes in use. Retyping and proofreading plant lists just wasn't my scene. So, out of laziness, I decided to enter each species onto a computer database, with genus, family, page in Hitchcock, native or alien, annual or perennial, wetland indicator status, protected status, as well as the various preserves on which it was reported and who had botanized there and when. No more flipping through books and bulging file folders of lists for me! Now I could count the native species, add new plants, or realphabetize instantly. Where should I go in Lane County to see a *Ceanothus cuneatus* community? (Mt. Pisgah.) How many native annual grasses are found in Willamette Valley wet prairies? (Ans: 5.) Does a proposed BLM RNA in the Coburg Hills have plants not represented in the federal system? (Yes: 12.) What site has the lowest percentage of introduced species? (Gold Lake Bog RNA: 8%). Where is the northernmost reported preserve occurrence of *Frasera umpquaensis*? (Upper Elk Meadows.)

This modest local endeavor blossomed into a much larger project. (It is now 1041 species at 60-odd sites in six counties!) Of course, botanists in the field had done the real work--a single list could represent 8 or 9 seasons of careful observation by a half dozen experts. My focus has been to create a careful prototype, get it in circulation, expand coverage, and send around a short correction sheet later. (I don't agonize endlessly over the problematic taxa like a true systematic botanist--let them refine their own copy of the disk!) Most sites will have revised plant lists next fall anyway.

The project seems to have met a genuine need. Letters come in from contract botanists, field botany teachers, wetland property owners,

seed bankers, restorationists, consultants, summer interns, county planners, federal and private site managers, serious amateur botanists, people with conservation questions and even out-of-state herbaria staffers. Since there is a lot of 'cross-over' membership, I also got requests from wildlife groups to match data base structures to their project needs!

I decided to spin-off the plant disk as a (less-than) non-profit entity--the Emerald dBase--separate from NPSO and the other groups. I am still interested in coordinating with other NPSO members who would like a flying start in extending the project to their area--why not have state-wide coverage! Data entry is very rapid and scarcely any typing is involved at this point. The project complements the Natural Heritage Data Base, which tracks mainly threatened plants and communities.

My long-term goal is to turn the whole thing over to an appropriate party and wash my hands of it, except as a user! The 1990 Repo is available spiral-bound to NPSO members in good standing at 4¢ a page (\$7.60+ \$1.30 postage, C/O EmdB, POB 3429 Eugene, Or 97403)--it's worth a look if you've ever envisioned starting a similar project. The disk is also available under terms to responsible parties in Mac or ASCII format. (Would you like a botanical spell-checker for your computer?)

Tom Pring
Emerald Chapt

Salix arctica

Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest
by Hitchcock and Cronquist
University of Washington Press



NPSO TAKES PART IN NEWS CONFERENCE

The following press release was written by Dr. Rhoda M. Love for a Jan. 8 1990 joint news conference with Audubon Society and the Oregon Natural Resources Defense Council. Research done by Jim Stickler and supported by the ONRC showed that BLM budgeting and management practices have lead to inadequate surveying of rare and endangered species in proposed timber sales. Over 5 years 44% of BLM sales in Western Oregon had no botanical surveys at all, and some of the surveys done were not adequate or simply ignored when planning was done. Dr. Love was instrumental in toning down 'BLM bashing' by other participants and she emphasized positive suggestions to rectify the situation here in Oregon--which, unfortunately, is the best in the nation. She states that it is very important to encourage the BLM to adopt a bureau-wide sensitive plant list.

The statement was read by Dr. Love in Eugene, and in Portland by Bryan Boyce. Press coverage resulted in a broadcast over *National Public Radio* and an article in both the *Oregonian* and the *Eugene Register-Guard*. Eugene affiliates of the 3 major TV networks broadcast reports.

JANUARY 8, 1990
DR. RHODA M. LOVE
NATIVE PLANT SOCIETY OF OREGON

For the many rare plants growing on Bureau of Land Management land in Oregon I have good news and bad news. First the good news: the BLM is the only Federal Agency in our state with a qualified professional botanist in every district. This was not always the case. In the early 1980's, when I became president of the NPSO, we were worried that a large number of Oregon's rarest and most vulnerable plants grew in BLM districts with no botanist to watch over them. However the Bureau responded to letters from our group, and a botanist was hired for each district.

Unfortunately, however, as Mr. Stickler's research shows, the bad news for Oregon rare plants is that the BLM has not taken very obvious follow-up actions necessary to save these

plants from extinction. In my opinion, just 3 rather simple policies, if put into effect by the BLM, would bring the agency into compliance with federal law, and would greatly improve the chances of saving Oregon's rare plants.

The steps are:

- (1) Additional, seasonal, college-trained botanists (not so-called "parabotanists") must be hired so that all rare plants can be found, reported and properly surveyed.
- (2) Botanists must visit rare plant sites at proper flowering and fruiting times.
- (3) Botanists' findings and recommendations concerning rare plants must be taken into account when policy is formulated.

It has been amply proven that the people of the United States want protection for endangered species. In Oregon, an Endangered Species Bill passed both the House and the senate unanimously. Legislators involved with this bill will attest to the large volume of mail and the hours of testimony they received in its favor. In the past the BLM has shown sensitivity to citizen concern for rare plant protection. The NPSO calls upon the Bureau to support their botanists and see that Oregon's rare plants receive the protection to which they are entitled by law.

PINS—PINS—PINS

A new batch of NPSO trillium logo pins are available. These are sturdily made of enameled metal and feature an open, cutout design. Members report that the pins are so attractive that hikers met along trails inquire about where to purchase them. Others state that their pins have survived trips through the laundry! The pins make good gifts too. Part of the price goes towards supporting all our NPSO activities.

The pins will be available at chapter meetings and other events soon for \$2.50. Chapters wishing to raise funds can order them in packages of 5 from Esther Kennedy, 6124 NE 28th Ave., Portland, Or. 97211 (287-3091).

THE JEAN DAVIS AWARD

Each year the NPSO awards a worthy student majoring in plant systematics or ecology at an Oregon college or university a tuition scholarship for \$1,000. This award is backed by a fund, and as many awards are given as can be funded by interest generated by it. Donations to the fund are tax deductible and are accepted year around. This is a good way to encourage future experts in botanical science.

All communications about this fund should be sent to Mary Falconer, Scholarship Committee Chair 1920 Engel Court NW
Salem, OR., 97304

RULES FOR SCHOLARSHIP AWARDS

- 1) Scholarships are available to students in Oregon colleges and universities, whose major field of study is plant systematics or ecology.
- 2) Scholarships are in the amount of \$1,000 to worthy full-time students who will complete at least their second year of satisfactory college work by July 1st of the year of application. Graduate students need not be full-time.

3) Awards are handled in the following way:

- a) A certificate is given the recipient.
 - b) A check in the amount of the award is sent to the school of choice, to be applied towards tuition within the following academic year.
- 4) If an award recipient fails to enroll, change his or her major, or leaves school before completing the period for which the award was granted, the full amount or unused portion of the award shall be returned to the Fund.

Apply by submitting the following:

- a) In your own writing, a statement of academic and career intent.
- b) Two letters of reference from persons able to assess your ability to successfully complete study in the field of systematics or ecology.

All applications must be received by the Scholarship Committee Chair no later than April 1st. The award will be made by May 1st.

Scholarships are not granted to Scholarship Committee members or their relatives.



Cornus stolonifera and *Cornus nuttallii*
Drawings by Jeanne R. Janish in
Flora of the Pacific Northwest
By Hitchcock and Cronquist
University of Washington Press



"OF PLANTS AND ROCKS: GEOBOTANY IN OREGON"
THE NATIVE PLANT SOCIETY OF OREGON
HIGH DESERT CHAPTER (BEND)
1990 FIELDTRIPS

During 1990 the High Desert Chapter of NPSO celebrates its tenth anniversary by sponsoring a series of excursions that will highlight the influence of local and regional geologic processes on our native vegetation. Several trips will feature not only botanical experts but also well qualified geologists. Please join us and take this opportunity to explore central Oregon's rich natural history.

The Native Plant Society of Oregon is a non-profit group interested in the enjoyment, study, and conservation of Oregon's native vegetation. Founded in 1961, we have over 900 members in 11 chapters statewide. Membership is open to all. The High Desert Chapter invites non-members to join us on our hikes. Amateurs and experts are equally welcome!

Most trips will leave from behind the north McDonalds Restaurant, 4048 NE 3rd St., Bend at 8:30 am sharp. We normally will return to Bend by 5 pm. Please be sure your gas tank is filled and arrive a few minutes early to car-pool. Riders are encouraged to reimburse drivers. 20 cents per mile per car is a suggestion. Weather may be severe and roads and trails rough. Bring water, a sack lunch, sturdy boots, daypack, and consider layered clothing, sunscreen, handlens, camera, binoculars, ect. No picking or collecting plants is allowed. No smoking due to fire danger. Please leave your pets home. Please privately inform your trip-leader of important medical conditions. You participate at your own risk. Please call trip leaders for more information.

April 21 Sat. THE ISLAND
This spectacular grassland is reached by a steep, rough trail less than one mile long. The trail can be challenging for inexperienced or un-prepared hikers. Located in the Cove Palisades State Park, this spot is essentially ungrazed and features pristine, meadow-steppe plant communities. The area is managed by the BLM and USFS as a Research Natural Area.

Rattlesnakes have been seen on the trail. Geologist Larry Chittwood will accompany leader Stu Garrett (389-6981 eves; 382-2811 days).

May 12 Sat. PAINTED HILLS/SUTTON MOUNTAIN
An outing to a botanically and geologically fascinating area north of Mitchell. Easy hiking and rare plants highlight this trip to the Painted Hills Unit of the John Day Fossil Beds National Monument. Round trip driving distance is 150 miles. Geologist Ellen Morris Bishop accompanys trip leader Stu Garrett (389-6981 eves or 382-2811 days).

May 19-21 Sat.-Mon. LESLIE GULCH
Unique geology has given rise to spectacular scenery as well as to specific habitats for seven rare plant species. Located on the Owyhee River in Eastern Oregon near the Idaho border, this 3 day trip will require overnite camping in primitive conditions. Easy to moderate hiking after a long drive (probably 7 hours from Bend). This area has national park quality scenery. Please call trip leader for travel details if you plan to come. Geobotanist Jean Findley accompanys trip leader Stu Garrett (389-6981 eves; 382-2811 days).

Sat. July 14 IRON MOUNTAIN
A classic wildflower hike, located just north of the Santiam Highway. A moderate 2 mile hike each way on a good trail with 1500 ft. elevation gain. Call leader to register. Trip leader: Marge Ettinger (382-2255).

Sat. August 11 BROKEN TOP VOLCANO
Our annual hike to view the spectacular display of alpine wildflowers and glacial and volcanic geology on Broken Top Volcano. A 5 mile round trip moderate to strenuous hike with a 1500 ft. elevation gain, mostly in the Three Sisters Wilderness. Number of hikers limited due to wilderness area regulations, call trip leader to register. Geologist Bruce Nolf accompanys trip leader Stu Garrett (389-6981 eves or 382-2811 days).

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BULLETIN

GUIDELINES FOR CONTRIBUTORS

The NPSO Bulletin is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome. **Deadline:** Copy is due with the editor by the 10th of the month. **Text Format:** Submission can be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in. long, with spacing between columns .22 in. The Bulletin uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted into their favorite field guide. **Computer Disk:** The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details. **Illustrations:** Line drawings are preferred to pictures requiring halftone reproduction. Contact the editor about our current needs. **Credits:** If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available). **Return of Originals:** Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Address _____ Is this a change of address? _____
 If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
 Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO Bulletin. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () Bulletin Subscription only \$12.00
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* CONTRIBUTIONS:

Jean Davis Memorial Award Fund.....\$ _____
 Leighton Ho Memorial Award Fund.....\$ _____
 Rare and Endangered Plant Fund.....\$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Avenue NW, Salem, Oregon 97304.

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To increase the knowledge of members and public in identification and conservation of the native plants of the Pacific Northwest

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

22 Apr., Sun.

FIELD TRIP. Leave at 8am from the BMCC Greenhouse in Pendleton or at 9am from the Post Office in Umatilla. Visit the Umatilla Wildlife Refuge on the Columbia River with John Annear, wildlife biologist at the refuge. For more information contact Bruce Barnes (H-276-5547; O-278-2222).

Corvallis

7 Apr., Sat.

FIELD TRIP to McDowell Creek Park. Leave at 9am from the parking lot across the street from the Monroe St. Beanery. Bring lunch and water. Call Phil Hayes (753-1065) for more details.

Emerald

9 Apr., Mon.

MEETING. 7pm at the Westmoreland Community Center, 1545 W. 22nd.

28 Apr., Sat.

FIELD TRIP for the annual Lomatium count along the Long Tom. Depart from the South Eugene High School parking lot at 10am. Trip leader Sallie Klaggett (484-0199).

High Desert

21 Apr., Sat.

FIELD TRIP. Leave at 8:30am sharp from behind the McDonalds at 4048 NE 3rd St., Bend. The Island RNA in Cove Palisades State Park features pristine essentially ungrazed meadow-steppe communities. Expect a rough, steep trail and possibly rattlesnakes. Geologist Larry Chitwood will add his expertise. Leader: Stu Garrett (389-6981 eves or 382-2811 days).

24 Apr., Tues.

MEETING. 7pm at the Senior Center. Business at 7 and program at 7:30pm.

Mid-Columbia

4 Apr., Wed.

MEETING. 7:30pm at the Mosier School. Keith Chamberlain will present wildflower slides from his recent explorations. Highlighted will be some old favorites as well as some new surprises!

15 Apr., Sun.

Wildflower Show. 10am to 4pm at the Mosier School. The annual Wildflower Show in coordination with Mosier's Blossom Weekend and the infamous Firemen's Smorgasbord Dinner at the Mosier Grange Hall. Over 200 plant species are usually represented.

North Coast

5 Apr., Thurs.

MEETING. 7pm at State Office Building, 3600 3rd St., Tillamook. Since spring will be busting out all over, bring five of your favorite or scarce wildflowers to discuss.

21 Apr., Sat.

FIELD TRIP. Leave at 9:30am from the PUD bldg., or from Ranger Station at 10:15am. Destination is Mt. Hebo.

29 Apr., Sun.

FIELD TRIP. Leave at 1pm from the SW corner of the Cornet parking lot. Destination is Rain River. A short, easy walk. For information call Margaret Willets (842-7985).

Portland

7 Apr., Sat.

FIELD TRIP to Columbia Hills, by a new route from the Northwest. Leave at 8am from the K-Mart parking lot at NE 122nd and Sandy or 9am from the Bingen Winery on Washington Highway SR14. Leader: Elizabeth Handler (244-5320).

10 Apr., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Henrietta Chambers of the Corvallis Chapter will present a slide program on the flora of Central Oregon, especially Iron Mountain.

14 Apr., Sat.

FIELD TRIP to Silver Creek Falls. Discover the early blooming plants along the stream and in the meadows. Leave at 8am from the SE corner of the K-Mart parking lot in Tualatin (exit 289 off I-5 south). Leaders: Florence and Dick Ebeling (244-4122).

21 Apr., Sat.

FIELD TRIP to the Tonquin Scablands and Camassia Natural Area. Leave at 8:30am from the SE corner of the Tualatin K-Mart parking lot. A joint field trip with The Wetlands Conservancy. Two easy, short excursions for some of the best lowland wildflowers around. Birding glasses may be useful. Leader: Bryan Boyce (655-4457).

28 Apr., Sat.

FIELD TRIP to Hood River Mountain. Beautiful meadows, scenic slopes, easy walking. Leave at 8:30am from the K-Mart parking lot at NE 122nd and Sandy or 9:30am from Hood River Inn. Leader: Louise Godfrey (223-4785).

5 May., Sat.

FIELD TRIP to Catherine Creek from the North. A first opportunity to discover and enjoy the native plants in the upper areas of the Catherine Creek drainage. There will be a car shuttle. Leave at 7:30am from the K-Mart Parking Lot at NE 122nd and Sandy, and 8:30am from the Hood River Inn. Leader: Elizabeth Handler (244-5320).

Siskiyou

12 Apr., Thur.

Meeting. 7:30pm at Rm. 171, Science Bldg., Southern Oregon State College. Dr. Frank Lang, Professor of Botany at SOSOC, will read some favorite scripts from his KSOR broadcast, "Nature Notes", along with a slide presentation.

21 Apr., Sat.

FIELD TRIP to the "Banks of the Illinois River", lead by Wayne Rolle, botanist for the Siskiyou National Forest. Leave at 8:30am from the Medford K-Mart or from the Selma Market in Selma at 9:30am. A relatively short hike in steep country with some off-trail scrambling in boulders and rock outcrops. We will see *Arabis*, *Erythronium* and *Saxifraga* species. For information, call 482-0093.

Umpqua Valley

7 Apr., Sat.

FIELD TRIP. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. Spring flowers on the high basalt lava mesa of Table rock north of Medford. For more information contact Jack Hausotter (874-2462).

19 Apr., Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Bob Meinke will speak on the State Endangered Species Program.

17 May, Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Mildred Thiele will speak on the flora of Diamond Lake.

Willamette Valley

If you want to hear about unscheduled mid-week trips to places near or far, call Clint Urey (581-1805).

16 Apr., Mon.

MEETING. 7pm at Room 225, First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State St). Boon Kaufmann, Professor of Rangeland Management at OSU will speak on "Use of Fire as an Ecological Restoration Tool"

21 Apr., Sat.

FIELD TRIP. Leave at 8:30am from South Salem K-Mart. Visit Baskett Slough and nearby areas. Easy walk. Leader: Vi Sobolik (623-2630--Dallas).

William Cusick

For information, contact Karen Antell (963-0267).

BITS AND PIECES

—News and Information From All Over

ONRC TO HOLD FUNDRAISING AUCTIONS

The Oregon Natural Resources Council has two upcoming auctions to look into. The first will be in Eugene March 31, at the Wheeler Pavilion of the Lane Co. Convention Center at 6:30pm (Info: 344-0675). The second is in Portland April 8 in The Old Church at 5:30pm (Info: 223-9001). Sealed bid forms and a list of auction items can be obtained from either the Eugene or Portland ONRC office. Featured items include a kayak, bicycle, Amazon River trip, Peruvian jungle survival course, Mexico trip, birding out of Nome, Alaska, an Alaskan wilderness photo expedition, many Northwestern river trips, and a wide variety of other items donated by hundreds of people concerned with the protection Of Oregon's natural resources.

AMERICAN CALOCHORTUS SOCIETY FORMS

A society interested in the showy genus *Calochortus* has formed under the leadership of H.P. McDonald. The organization is concerned with preservation of the dwindling wild stands and interested in the horticultural potential of these bulbs. The group wishes to develop information about *Calochortus* and spread the news in their newsletter, *The Mariposa*. Projects of the fledgling society include a horticultural history of the genus, working with government agencies on preservation issues, and sharing horticultural experiences with the plants. The genus is widespread in the West, and is most common in California. Oregon has about 8 species in its flora.

Membership, including the newsletter, is only \$2 yearly. For information write: H.P. McDonald, 260 Alden Rd., Hayward, Ca. 94541.

COUNTRY IN THE CITY SYMPOSIUM

The third annual Country in the City Symposium will take place April 25th-28th. Location will be Smith Memorial Center at PSU in Portland. It will focus on urban stream and wetland management and restoration. The symposium also will emphasize bringing together the technical and engineering community, planners, elected officials, and public interest groups. The Technical Workshop on April 25th & 26th will present current ideas on urban stream and wetland restoration. This is the practical nuts and bolts stuff, especially of interest to those professionally involved in management and restoration of urban stream and wetland corridors. Fanno Creek will be the focus of discussion and field sessions. The General Conference on April 27th and 28th will approach the subject from a broader perspective, and will be aimed at citizens, conservation groups, planners, educators, elected officials and others concerned with the development of urban areas.

Primary sponsors are Audubon Society of Portland's Metropolitan Wildlife Refuge System Project; Fred Meyer Charitable Trust; PSU; and the US Environmental Protection Agency's Office of Wetlands. Ten other organizations are co-sponsors. The presentations will be of highest quality, with speakers from throughout the country. The 18 field trips should be impressive, covering many important urban area wetlands, greenways and stream corridors.

The sessions can be attended separately or together. Costs are \$90 for the Technical Workshop, \$45 for the General Conference, or \$120 for both. More information and forms are available from Mike Houck at 503-224-1004.

GLIDE WILDFLOWER SHOW

The 26th annual Glide Wildflower Show is on Apr. 28th-29th in the Glide Community Bldg., Glide Ore, 8-5 daily. More than 500 SW Oregon wildflowers, trees, shrubs, liverworts, mosses and lichens will be on display. In addition, there is a slide program, an exhibit on edible wild plants, and displays by both the USFS and the BLM. Free; contributions welcomed. For more information call 503 4960-3236.

The High Desert Chapter has elected new officers. They are as follows:

President: Bill Hopkins work # 388-7426
Secretary-Treasurer: Dorothy Brantly
Program Chair: Joyce Bork COCC 382-6112
Field trip Chair: Stu Garrett 382-2811

WILDFLOWERS OF OREGON POSTERS

The attractive color "Wildflowers of Oregon" poster is available through Susan Gabay. They are \$4.95 postpaid individually or in groups of ten for \$30 plus postage for chapters or others wishing to raise funds by reselling them. Contact Susan at Box 151, Mosier, Or 97040 (478-3576).

The Mapleton Ranger District of the Siuslaw National Forest is currently recruiting three GS 5 or 7 Biotechs with an emphasis on botanical skills to conduct sensitive plant surveys in proposed timber sales areas. The temporary appointments would run from April 22 through September, possibly longer. Applicants should complete State Employment division Form 1613 to register with the SED and submit that form along with a SF171 Form and a list of course work to :
State of Oregon Employment Div.
2510 Oakmont Way
Eugene Or 97401
Attention: Cinda Smith

For information regarding applying for these positions, Contact Cinda at: 503-686-7601. For more info regarding the jobs, contact Heidi Vogt at the Ranger District office at 503-268-4473.



Quercus garryana, Oregon White Oak
by Herm Filtz

WE CANNOT RELAX OUR EFFORTS TO SAVE OREGON'S REDWOODS

In our February *Bulletin*, Editor Bryan Boyce printed an appeal from me for help to save Oregon's remaining redwoods. On January 15, The Eugene *Register-Guard* printed the same appeal as a guest editorial.

About one week after my editorial appeared, newspapers reported timber sales which included redwoods were put on hold in Siskiyou National Forest pending more study. Considering the redwood crisis over, *The Register-Guard* stopped accepting letters on the issue. Believe me, fellow NPSO members, there is still an urgent need for action. Redwoods are cut daily in the Chetco District. Donna Seeman, a Brookings NPSO member let me know that redwoods are being felled as part of previous timber sales and log trucks are hauling them daily and will do so probably until Sept. I urge every *Bulletin* reader to write protesting present redwood logging and asking for a ban on future redwood timber sales. And I warn you to read carefully the reply you may get from Ronald J. McCormick, Supervisor, Siskiyou National Forest.

Let me analyze what I consider to be the most misleading statements in a form letter some of us received from McCormick in January: (1) McCormick repeated a statement which I have seen credited to him often in the newspapers that there are 14,000 acres of redwoods in Oregon. The verified figure is less than 1400 acres. (The 14,000 acre figure is found by dividing the forest into clear-cut units and summing the acreage of every unit containing even one redwood!) (2) McCormick regularly states that 4500 acres containing redwoods are protected in Oregon. This, of course, is nonsense, as only 1400 acres of redwoods remain. Notice how the word "containing" is used to mislead readers. Chetco Ranger Michael Frazier informs me that only 720 acres of redwoods receive any protection in Oregon. (3) Please note also that when the word "protection" is used, it may not mean what you and I presume it means. There is, for example, on the Chetco the tiny (~337-acre) redwood-containing

Wheeler Creek Research Natural Area. From personal experience I can assure NPSO members that RNA status does not guarantee protection. The usual practice is to log to the boundaries of an RNA on all sides, leaving it a tiny island of old growth in a vast clear-cut sea. It takes only the first fierce storm of winter to topple the trees which are then sold for salvage, and goodbye, redwood RNA.

There are even more important facts to keep in mind as you read Forest Service letters: (4) In his letter McCormick writes that "to maintain redwoods as part of a healthy ecosystem we need to have all age classes: seedlings, juveniles, middle-aged trees and old growth". The insidious thing about that statement is that everyone agrees with it. However, while you and I would implement that policy by preserving remaining old growth and planting redwoods on logged areas, I feel sure that the McCormick plan involves cutting all unprotected stands to "convert" them to younger age classes. (5) Finally, and perhaps most frightening of all, McCormick asks that a citizen's task force be set up to "help us sort out whether harvest of redwoods is an appropriate tool to meet multiple objectives." I do hope the reader understands what this means. The task force will, of course, include folk from all sides of the issue, industry and concerned citizens. This sounds nice; however, when group dynamics begin, both sides will be urged to compromise. (Just ask Maradel Gale who sits on such a task force if I am not correct.) My question is, with less than 1,400 acres of redwoods remaining, why should our side compromise? Our wishes were already compromised in the past before we were even asked for our opinions. I suggest that we stay off task forces and demand that no more redwoods be cut in Oregon.

I believe we may still save Oregon's remaining redwoods. But we must make our voices heard not only in Oregon but across the United States. National Forests belong to all Americans. Write to the individuals below and protest the cutting

of Oregon redwoods. Please write friends and relatives in other parts of the U. S. and ask them to protest to their federal senators and congresspersons. Write to: Ronald J. McCormick, Forest Supervisor, Siskiyou National Forest, 200 NE Greenfield Rd., PO Box 440, Grants Pass, Or. 97526-0242. Send copies of your letter to The Honorable Mark O. Hatfield, United States Senate, Washington DC 20510. Ask for replies. Please help save the last of one of our planet's most magnificent species.

Rhoda M. Love, Emerald Chapter

BLM RELEASES FINAL ENVIRONMENTAL IMPACT STATEMENT

The Bureau of Land Management has released its Final Oregon Wilderness EIS, recommending about 1.1 million acres for wilderness. 1.5 million acres in wilderness study areas are recommended for no further study. Areas receiving all-wilderness recommendation include Hawk Mt. WSA (relatively ungrazed native bunchgrasses), Honeycombs WSA (habitat for *Astragalus sterilis*, *Astragalus solitarius*, *Mentzelia packardiae*, *Senecio erterae*, *Ivesia rhypara*, and *Trifolium owyheense*) and Spring Basin WSA (home to *Castilleja xanthotricha*, *Astragalus diaphanus* var. *diaphanus*, *Penstemon eriantherus* var. *argillosus* and *Pediocactus simpsonii* var. *robustus*).

Areas not recommended include Cougar Well WSA (in which *Rorippa columbiæ* is thought to occur), North Fork WSA (containing 2 streams in which the riparian vegetation is in potential natural community and which has a population of *Claytonia umbellata*), Palomino Hills (home to *Lepidium davisii*), and Bowden Hills WSA (large areas of black sagebrush and "large patches" of sand dropseed). One revealing aspect of the EIS is the projected actions for those WSAs and portions of WSAs not recommended for wilderness. Under the Proposed Action, about 55,000 acres will be altered for livestock with an additional 30,000 acres removed for range facilities. About 85,000 acres, or 133 square

miles of high desert identified as "substantially natural" will be manipulated in one way or another. Unclear is how much is crested wheatgrass seeding. It is clear that 141,410-acre Basque Hills WSA, only 3 percent of which is influenced by unnatural features, will have 45,000 acres seeded to crested wheatgrass. BLM hired a private firm to assess mineral potential during the review process and requested more detailed study of WSAs from the Bureau of Mines, but no similar effort to identify sensitive species or other wilderness values in the study areas was made.

Individual adopters of wilderness study areas will be working hard this year to compile information on areas BLM did not recommend for wilderness. Many have requested help inventorying the botanical values of their areas. Any NPSO member who needs an excuse to spend some time in Eastern Oregon this summer is urged to contact the Oregon Natural Desert Association at PO box 1005, Bend, Or. 97709 info@oregonnatdes.org

EDUCATION COMMITTEE REPORT

The Education Committee will be working on two slide shows this year. One will be on the Endangered Species of Oregon. This show will educate the public on State and Federal R&E laws, natural history of some endangered and threatened species, and species conservation.

A second program will be on of plants of Oregon. This program will give viewers a general overview of the diversity of Oregon's plant communities. Each NPSO chapter would donate 15 good horizontal slides with script. The script should include descriptions of plant communities, special areas of interest, and general information about the Chapter's area. A target date of June will be set to get submissions from each chapter. The general audience for our first educational programs will be high school, college, and general public. Eventually it would be nice to incorporate a show at the elementary level. Any volunteer help or suggestions are welcome!

LEGISLATIVE NOTES
ANCIENT FOREST
PROTECTIVE LEGISLATION

Our ancient or old-growth forests need protection for maintaining a diversity of plant communities in the forest. A number of bills are being worked on at this moment for protection of the remaining old growth forests. These legislative proposals include: reduction in the rates of cutting on national forests to sustainable levels, protection of significant stands of old growth, and reform of forestry practices.

It is necessary for your representatives to hear from you regarding the future of old growth forests on public lands. There should be long-term management of forest ecosystems, including old growth. The size of old growth areas need careful consideration. Small old growth areas may not protect all old growth values. The old growth areas must not be isolated "islands" in a sea of clearcuts or of managed even-aged trees. Longterm planning must consider corridors of connected tracts that will allow plant and animal distribution to occur.

The future management of public forests must include long-term planning for the whole forest ecosystem. Long-term planning with sustainable yield in mind must be implemented if we are to have forest products and forest research areas for future generations to benefit from. Write your representatives today!

---Esther McEvoy, Corvallis Chapter

SOUTH COAST CHAPTER HOPEFULS
SET ORGANIZATIONAL MEET

A meeting of all people interested in forming a South Coast Chapter of NPSO will take place at 1pm Sat. Apr. 28th at the University of Bandon, 460 1st. St (next to the old Coast Guard building). A representative of the NPSO will be on hand to answer questions and discuss upcoming field trips. Everyone's welcome. For directions or information, call Josie Bridges at 347-9269.

THIS SEASON AT THE NATURE
CONSERVANCY'S MCCALL PRESERVE

The Tom McCall Preserve at Rowena Plateau combines one of the richest spring wildflower displays in Oregon with a spectacular vista of the Columbia River Gorge. A naturalist will be available on the Preserve weekends March 17 through May 20, 11:00 AM through 4:00 PM. Directions: Situated between Hood River and The Dalles, the preserve is reached by taking the Mosier exit off I-84 and traveling 6 miles east to the Rowena Crest Viewpoint (Mayer State Park). Please park in the circular viewpoint and cross the scenic highway to the preserve entrance marked by a large wooden sign and a stile over the fence.

Hikers are reminded conditions on the plateau are primitive. No restrooms are available, and pets are not allowed. Please preregister for hikes, 228-9561. All events are free.

1. Rowena Wildflower Walks. Saturdays, April 7 & 21; May 5 & 19. The preserve has one of the most impressive displays of spring wildflowers. Enthusiasts could participate in all 4 hikes and view new flowers each time. Meet at the preserve entrance at 1 PM. Limit: 25.
2. Birds of the Tom McCall Preserve. Sunday, May 6, 8:30 AM. Hike to the top of McCall Point through a diversity of habitats. Ospreys, golden eagles and red-tailed hawks soar off the cliffs in search of prey. Lewis's woodpeckers and warblers are attracted to the oak woodland. Western meadowlarks, horned larks and mountain bluebirds are very visible in the open grassland. Early in the morning, ducks may be spotted on the ponds. Limit: 15.
3. Rowena Crest Weed Pull. Saturday, June 2 9:30 AM. Help pull diffuse knapweed to protect the native wildflowers and enjoy some great views of the Gorge. You will need to bring trowels, gloves, lunch and energy. Meet at the Rowena Crest Viewpoint and inspect the new wildflower interpretive garden. Limit: 999.
4. Tom McCall Preserve Group Hikes. Dates by Arrangement. To make arrangements for a guided natural history hike for your group call Scott Pearson, Environmental Education Coordinator, at 228-9561. Limit: 25.

AROUND THE MOUNTAIN MT. HOOD, WE MEAN!

The Portland Chapter welcomes volunteers for the June 23rd and 24th Annual Flower Show at The World Forestry Center in Portland. Volunteers are needed for set-up Friday afternoon, June 22nd. The displays this year will concentrate on the flora of Mount Hood. Help will be needed for the following:

Northside Table	Heath Family Table
Southwest Table	Touch Table
Eastside Table	Don't Touch Table
Timberline Table	Alien Plants Table
Bog-to-Meadow Table	Publicity
Book Sales	Host/Hostess crew
Clean-up Crew-5pm Sunday June 24 for 1.5hr.	

To find out how to help out call: Show Chairperson Laura Gasaway (668-5076-h or 663-3520-w); Jeannne Huffstutter (244-8224); Louise Godfrey (223-4785); or Florence Ebeling (244-4122).

Friday's crews can bring eating utensils and food to share for a pause that refreshes at 6pm.

We hope that Don Eastman's book on rare and endangered plants will be ready for sale.

No plants will be sold. Only pictures of sensitive flora will be displayed. Slide shows will be featured both days. Botany teachers can select flowers they can use at the end of the show. Those displaying cherished plants can recover them after the show if they label them.

This popular show has attracted larger audiences each year since its inception 11 years ago. The show helps the society educate the public and its members about our native plant resources. A special welcome is extended to newcomers in our community who would enjoy an exciting project and meeting many fine NPSO members.



Arbutus menziesii, Madrone
Drawings by Ramona Hammerly
from *Northwest Trees*
by Stephan Arno and Ramona Hammerly
The Mountaineers, Seattle
Used by permission.

EARTH DAY 1990

High hopes for Earth Day 1990 have been expressed by event organizers. They are expecting massive turnouts for the wide range of planned events not only here but in the more than 130 countries involved. World-wide participation is expected to reach over 100 million people. In the US they hope to double the 1970 turnout of 20 million on Earth Day itself, with many more in the other events taking place.

Earth day has its origins in a late 1969 speech in which Sen. Gaylord Nelson suggested a "teach-in" to encourage concern for the environment. This speech created a huge response which led to Earth Day 1970 on April 22nd. We are now approaching the 20th anniversary of that event. It is still on record as the largest demonstration ever in the US.

A wide variety of government agencies, environmental groups, and other organizations will sponsor or participate in a long list of events for Earth Week, Earth Day Eve, and Earth Day 1990 itself. Oregon cities with planned Earth Day events include Eugene, Salem, Hood River, Beaverton, Tigard, Boring, Corvallis, Newport, Cannon Beach, Brookings, Klamath Falls, McMinnville and Bend. For further information on these events contact: Earth Day 1990 Oregon, 2525 SW 1st #140, Portland 97201 (503 228-1134). They are swamped so give them plenty of time to respond.

PORTLAND AREA EARTH DAY EVENTS

Earth Day 1990 Symposium on Environmental Concerns in Washington County
April 11th, 7 to 9 pm, at the Oregon Graduate Institute, 19600 NW Von Neumann Dr., Beaverton (corner of Cornell & Walker) in the Main Seminar Room of the Administration Building. Presented by the Oregon Graduate Institute of Science & Technology and co-sponsored by Portland Audubon's Metropolitan Wildlife Refuge System and The Wetlands Conservancy.

This symposium features as keynote speaker Mike Houck of the Audubon Society speaking on

"Urban Wetlands and Water Quality: A Wildlife Perspective". Six more expert presentations are slated. Free.

The Mayor's Ball

April 21st, Earth Day's Eve. The Mayor's Ball will adopt an Earth Day theme and encourage participants to wear green. Part of the proceeds will go to Environmental Federation of Oregon, thus benefiting all its members including the NPSO. Other funds from this event will assist programs designed to help youth.

Portland Earth Fair

April 22nd., 10 am to 6 pm, at the World Trade Center, 121 SW Salmon, Portland. This will feature about 100 "issue pavilions" manned by environmental, government, business and neighborhood groups. At noon a "Drumming for the Earth Ceremony" will take place, at 1pm a "Tree Planting Procession" begins, and at 5pm a "Peace Pole and Peace Prayer Ceremony" is slated. Also look for parades, kite flying contests, speakers, cooperative games, and food.

EUGENE AREA EARTH DAY EVENTS

A wide variety of speakers are scheduled at UO during Earth Week, starting April 16th. Consult the upcoming Earth Day Calendar or call the Earth Day office at 687-9424.

Earth Ball

Tuesday April 17th at 8pm in EMU Ballroom on the UO Campus, with Cian Dyken & Lone Wolf.

Air Care Thursday

Thursday April 19th Lane Transit District offers free bus passes all day. Everyone's encouraged to use auto alternatives--walk, bike, use the bus.

Concert with Jim Scott and the University Singers

Friday April 20th, 7:30 at the EMU Ballroom.

Kid's Earth Day Celebration

Saturday April 21st., a celebration of John Muir's birthday at the UO Campus.

Pre-Earth Day Fair

April 21st., This will happen at Down to Earth and features speakers and workshops.

Earth Day Fair

April 22nd., 12 noon to 6pm at Alton Baker Park. This will feature booths for community groups and environmental businesses, music, speakers, food, and new games for all.

BLM AND THE CENTER FOR PLANT CONSERVATION SIGN CONSERVATION AGREEMENT

The BLM and the Center for Plant Conservation recently reached agreement for working together to manage and plan recovery of threatened and endangered native plants found on BLM land nationwide. The Center will work with each BLM state office to develop projects that support rare species conservation. The projects will include plant and seed storage, conservation research, and reintroduction of plant species into natural habitats. The center and its cooperating gardens and arboreta will train BLM workers in the conservation and reintroduction of rare plants.

Center for Plant Conservation executive director Don Falk states that "The center has the expertise and the facilities through its professionals to help BLM conserve the rare plants found on the nation's public lands". The primary architect of the new agreement is Linda R. McMahan, now executive director of Portland's Berry Botanic Garden. Previously she was CPC's Director of Botanic Garden Programs.

Berry is one of the CPC's network of cooperating gardens and is involved in contracting with BLM and other agencies to collect, store and grow seeds from rare and endangered species of the Northwest. BBG workers study techniques for storage, germination, growing and reintroduction to native habitats of threatened native plants.



Penstemon cardwellii
drawing by Jeanne R. Janish
in *Flora of the Pacific Northwest*
by Hitchcock and Cronquist
University of Washington Press
Used by permission.

OREGON CONGRESSIONAL DELEGATION ADDRESSES

Whether motivated by praise or outrage, those of you wishing to contact your elected representatives can use these numbers:

Senator Mark O. Hatfield
Senate Office Building
Washington, DC 20510 (202) 224-3753

Senator Bob Packwood
Senate Office Building
Washington, DC 20510 (202) 224-5244

Congressman Les Aucoin
House Office Building
Washington DC 20515 (202) 225-0855
[1st District: Clatsop, Columbia, Lincoln, Tillamook, Washington, Yamhill, and portions of Multnomah and Polk Counties.]

Congressman Bob Smith
House Office Building
Washington DC 20515 (202) 225-6730
[2nd District: Hood River, Wasco, Sherman, Gilliam, Morrow, Umatilla, Union, Wallowa, Jefferson, Wheeler, Grant, Baker, Deschutes, Crook, Klamath, Lake, Harney, Malheur, and portions of Josephine and Jackson Counties.]

Congressman Ron Wyden
House Office Building
Washington DC 20515 (202) 225-481
[3rd District: portions of Clackamas and Multnomah Counties.]

Congressman Peter Defazio
House Office Building
Washington DC 20515 (202) 225-6416
[4th District: Coos, Curry, Douglas, Land and portions of Benton, Jackson, Josephine, Linn and Marion Counties.]

Congressman Denny Smith
1213 Longworth Office Bldg.
Washington DC 20515 (202) 225-5711
[5th District: portions of Benton, Clackamas, Linn, Marion, and Polk Counties.]

STATE OFFICERS

DIRECTORS.....	Jerry Igo, Nancy Fredricks, Paula Brooks, Barbara Mumblo, Marjorie Willis
PRESIDENT.....	Stu Garrett..... Bend Memorial Clinic, Bend 97701; 382-2811
IMMEDIATE PAST PRESIDENT.....	Dan Luoma..... 2912 NW Arthur Ave., Corvallis 97330; 758-8063
VICE PRESIDENT.....	Elizabeth Handler..... 4712 SW Iowa, Portland 97221; 244-5320
SECRETARY.....	Rhoda Love..... 393 Fall Vue Dr., Eugene 97405; 345-6241
TREASURER.....	Daphne Stone..... 30567 Lebleu Rd., Eugene 97405; 344-3274

STATE COMMITTEE CHAIRS

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CONSERVATION.....	Ed Alverson..... 110 NW 31st, Corvallis 97330; 753-3051
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MEMBERSHIP.....	Mary Falconer..... 1920 Engel Ct. NW, Salem 97304; 585-9419
WILDFLOWER POSTERS.....	Susan Galloway..... P. O. Box 151, Mosier 97040; 478-3576
NOTECARDS.....	Nancy Fredricks..... 34213 Riverside Dr. SW, Albany 97321; 967-1893

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MID-COLUMBIA.....	Keith Chamberlain..... Box 271, Mosier 97040; 478-3314
NORTH COAST.....	Sallie Jacobsen..... 6800 5th NW Cape Meares, Tillamook 97141; 842-4350
PORTLAND.....	Esther Kennedy..... 6124 NE 28th Ave., Portland 97211; 287-3091
SISKIYOU.....	Richard Brock..... 540 Oak St., Ashland 97520; 482-4111
UMPUQUA VALLEY (Roseburg).....	Rose Holmes..... 322 Arcadia Drive, Roseburg 97470; 672-4635
WILLAMETTE VALLEY (Salem).....	Rose Hayden..... 4455 Shoreline Dr. N, Keizer 97303; (w)378-8486 (h)390-4004
WM. CUSICK (LaGrande).....	Karen Antell..... Biology Dept., EQSC, LaGrande 97850; 963-0267

EDITOR..... Bryan Boyce..... 13285 S. Clackamas River Dr., Oregon City 97045-9411; 655-4457

BULLETIN

GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Submission s can be in any form. Camera-ready copy should be in 3,334 in. wide columns up to 9.3 in long, with spacing between columns .22 in. The *Bulletin* uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted into their favorite field guide.

Computer Disk: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings are preferred to pictures requiring half-tone reproduction. Contact the editor about our current needs.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Names: Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al. when appropriate. Use of both scientific and common names is encouraged. Indicate genus and species (underlining if italic is not available).

Return of Originals: Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____

Address _____ Is this a change of address? _____

City _____ State _____ Zip+4 _____ If so, please write your Old Address here: _____

Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New	() Renewal	() Quarter Membership (Sep.-Dec.)	\$3.00	() <i>Bulletin</i> Subscription only	\$12.00
() Student			\$ 8.00	() Sustaining	\$ 30.00
() Regular			12.00	() Patron	100.00
() Family Membership			18.00	() Life Member	500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund.....	\$ _____
Leighton Ho Memorial Award Fund.....	\$ _____
Rare and Endangered Plant Fund.....	\$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

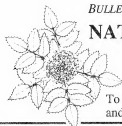
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Send change of address notices to:
Native Plant Society of Oregon
Mary Falconer, Membership Chair,
1920 Engel Court NW,
Salem, Oregon 97304



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To increase the knowledge of members and public in identification and conservation of the native plants of the Pacific Northwest

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

5 May, Sat.

FIELD TRIP to Upper Wildhorse Creek. Leave at 8am from the BMCC Greenhouse in Pendleton. Leader is Jerry Baker. For information call Bruce Barnes (276-5547).

20 May, Sun or

27 May, Sun

FIELD TRIP to Yellowjacket road and on south. Leader: Ruth Rouse. Leave at 8am from the BMCC Greenhouse in Pendleton. Call Ruth at 276-4791 or Bruce Barnes at 276-5547 to find out which date--depending on flowering time of *Lewisia* and chocolate lily.

Corvallis

For information, call Wes Messinger (929-4002).

Emerald

14 May, Mon.

For more information on field trips, call Sally Claggett at 484-0199.

MEETING. 7pm at the Westmoreland Community Center, 1545 W. 22nd. Speaker to be announced.

5 May, Sat.

FIELD TRIP to the West Eugene Wetlands with Steve Gordon. Depart from the South Eugene High School parking lot at 10am.

12 May, Sat.

FIELD TRIP to U of O Foundation Land in West Eugene with Tom Pringle. Depart from the South Eugene High School parking lot at 10am.

26 May, Sat.

FIELD TRIP to Marcola BLM with John Koenig. Depart from the South Eugene High School parking lot at 10am.

11 June, Mon.

MEETING. 7pm at the Westmoreland Community Center, 1545 W. 22nd. George Atiyeh will speak on Opal Creek.

High Desert

12 May, Sat.

FIELD TRIP. Leave at 8:30am sharp from behind the McDonalds at 4048 NE 3rd St., Bend. Painted Hills/Sutton Mountain. An outing to a botanically and geologically fascinating area north of Mitchell. Easy hiking and rare plants highlight this trip to the Painted Hills Unit of the John Day Fossil Beds National Monument. Round trip drive is 150 miles. Accompanying geologist: Ellen Morris Bishop. Leader: Stu Garrett (389-6981 eves or 382-2811 days).

Mid-Columbia

2 May, Wed.

MEETING. 7:30pm at the Mosier School. Rick Brown, Resource Specialist for the National Wildlife Federation, will present a program on "Ecology and Conservation of the Old Growth Forest".

North Coast

3 May, Thurs.

MEETING. 7pm at State Office Building, 3600 3rd St., Tillamook. Al Krampert will give a slide presentation about reclaiming and preserving Chiuwaukie Prairie in SE Wisconsin. Also, members are encouraged to bring wildflowers and plants you want to talk about.

19 May, Sat.

FIELD TRIP to Tillamook Head. Leave at 9:30am from the PUD parking lot in Tillamook. For information call Al Krampert (842-7985).

Portland

5 May., Sat.

FIELD TRIP to Catherine Creek from the North. A first opportunity to discover and enjoy the native plants in the upper areas of the Catherine Creek drainage. There will be a car shuttle. Leave at 7:30am from the K-Mart Parking Lot at NE 122nd and Sandy, or 2nd pickup 8:30am from the Bingen Winery. Leader: Elizabeth Handler (244-5320).

8 May, Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Bonnie Brunkow, director of Leach Botanical Garden will talk and show slides on native plants and seed hunting in Argentina.

12 May, Sat.

FIELD TRIP to Sunflower Flats, a favorite botanical area for spring taxonomy enthusiasts. Leave at 7:30am from the K-Mart parking lot at SE 82nd and Milwaukie Expressway. Leader: George Lewis (292-0415).

19 May, Sat.

FIELD TRIP to Haystack Butte. This area offers a new experience for our Portland Chapter members. A 2.5 mile walk to the summit of the 3000' Butte will bring opportunities to see many special plants. Leave at 7:30am from the NE 122nd and Sandy K-Mart parking lot. Leader: Mike Fuhey (1-206-694-2902).

26-27-28 May, Sat.-Mon.

Memorial Day FIELD TRIP to the North Umpqua River area. Forays into Boulder Creek Wilderness and Limpey Rock are planned. Motels are available in Glide and Roseburg, or campsites are at Round Creek Forest Camp. Leave from the Village Green parking lot in Cottage Grove at 10am. Leader: Dr. Dan Luoma (1-758-8063). Portland contact: Elizabeth Handler (244-5320).

2 June, Sat.

FIELD TRIP to Badger Creek. We will botanize along the School Canyon Trail on a ridge above the creek, in open grasslands, and pine-oak woodlands. Leave at 7:30am from the K-Mart parking lot at NE 122nd and Sandy. Leader: Rick Brown (222-1146).

Siskiyou

10 May, Thur.

Meeting. 7:30pm in Rm. 171, Science Bldg, Southern Oregon State College. Nan Hannon of the Southern Oregon Historical Society will discuss current ethnobotanical research in the region with a slide presentation.

12 May, Sat.

FIELD TRIP to Lone Pine Ridge. Richard Breck will lead a field trip in the Soda Mountain-Pilot Rock proposed Wilderness to search for early spring high elevation wildflowers, including *Fritillaria glauca*. Meet at the Ashland Bi-mart at 8:30am. Info: 482-4111. (Difficulty: moderate to strenuous.)

26 May, Sat.

FIELD TRIP to King Mountain. Leave at 8:30am from Medford K-Mart or from Siskiyou National Forest Headquarters in Grants Pass at 9:15am (take the North Grants Pass exit off I-5, turn right at stop sign, then another right onto Greenfield Road, then the first driveway on left). Rick Prusz will lead this field trip to King Mountain Rock Garden, a BLM Area of Critical Environmental Concern. This high elevation area contains two sensitive species, *Fritillaria glauca* and *Phacelia verna*. We hope to see *Fritillaria recurva*, *Erythronium*, and *Lomatium* species. Info: 482-4898. (Difficulty: easy to moderate.)

Umpqua Valley

17 May, Thurs.

MEETING. 7pm at the BLM Office, 777 Garden Valley Blvd., Roseburg. Mildred Thiele will speak on the flora of Diamond Lake.

26 May, Sat.

FIELD TRIP. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg. Geobotany trip to Little River to see *Calochortus umpquaensis* and Limpy Rock to see *Kalmiopsis leachiana* and *Asplenium septentrionale*. Leader: Namca Neyerlin. Contact Jack Hausotter for more info (874-2462).

Willamette Valley

12 May, Sat.

If you want to hear about unscheduled mid-week trips to places near or far, call Clint Urey (581-1805).

FIELD TRIP. Leave at 8am from South Salem K-Mart. Visit Fanno Meadows, a Nature Conservancy preserve in the Coast Range 50 miles west of Salem, to continue monitoring the rare *Erythronium elegans*. Easy walk, but could be wet and muddy. Leader: Wilbur Bluhm (393-2934).

19-21 May, Sat.-Mon.

JOINT FIELD TRIP with the High Desert Chapter to Leslie Gulch on the Owyhee River in Eastern Oregon near the Idaho border. Unique geology has given rise to spectacular scenery as well as specific habitats for seven rare plant species. This 3-day trip will require overnight camping in primitive conditions. Easy to moderate hiking. This area has national park-quality scenery. You must call trip leader Stu Garrett (389-6981) even or (382-2811) days if you plan to come.

2 June, Sat.

FIELD TRIP for rare and endangered plant monitoring in Polk and Yamhill Counties. This will be an opportunity to take part in the state-wide NPSO R/E project and help "count noses" to determine the current status of these plants. Mostly drive-by survey with little walking. Leave at 8am from South Salem K-Mart. Leader: Wilbur Bluhm (393-2934).

William Cusick

For information, contact Karen Antell (963-0267).

The Willamette Valley chapter has new officers!

They are:

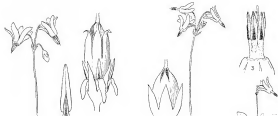
President: Mary Anne Westfahl

Vice President: Claire Carder

Secretary: Tom Jenkins

Treasurer: Glenn Halliday

Dodecatheon blossoms
by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist,
University of Washington Press



A BRIEF HISTORY OF THE PORTLAND CHAPTER SHOW

"A new and major project...a display of native plants for the interest and education of the public..." was announced in the NPSO *Bulletin* of Dec. 1975, to be held May 15 to 17 at OMSI.

How did this idea take hold of us? A wonderful display of Columbia Gorge flowers had been made at Wahkeena Falls for a week every June for the previous 20 years, by a garden club in Corbett. Faith Mackaness, the prime energizer, hoped that another group could continue the undertaking, and the Columbia-Willamette chapter of the American Rock Garden Society did so, under Faith's direction, in 1975. Some NPSO members involved, recognizing that Waukeena Falls was an impractical site except for nearby residents, resolved that a wildflower show would continue at a new site.

So, long before Nike's catch phrase was heard, we decided to "just do it". Ingenuity and innocence carried us along. George Jeffcott was president, Ruth Hansen our show chair, and dozens of members offered ideas and labor. The scheme for bark chips confined in plastic-lined frames to steady the containers was one of the better brainstormers. That first year we displayed 442 species in 249 genera, grouped by family. We were still all speaking to each other, after clearing out our entire mess in one hour. Many of that '76 crew are still working on the 1990 show--our fifteenth!

Our show at the World Forestry Center June 23rd and 24th will retain the bark chips and enthusiasm, but there have been changes. The bark now comes in bags, instead of by shovel and bucket from someone's pickup (whew!). We learned that a bog, six feet across, with water in a real pond, is a joy for the kiddies, but less so for us.

We have learned that less is better. Now, with specific assignments for collecting, there is little waste material. At first we over-collected, and this disturbed a good many of us.

We recognize that there are good members who question the value of a show that picks flowers, but we find that public response to our educational displays is very positive.

Our show is not static. Moving to the World Forestry Center in 1987, "Flowers in the Forest" was grouped by habitats. This year "Around the Mountain" will be in a new format to showcase the flora of Mount Hood.

Soon after NPSO chapters formed in 1977, the Mid-Columbia, Siskiyou, Willamette Valley and Emerald chapters were involved in excellent shows (apologies to any omitted?). Of course the best known show in Oregon, at Glide, began years earlier. Those of us involved in the Portland Chapter shows consider them worth the considerable effort, in the education of the public...and of ourselves

---Louise Godfrey, Portland Chapter



Euonymus occidentalis, The Western Wahoo
Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist
University of Washington Press

CONSERVATION ALERT!

The Newberry Volcanoes National Monument legislation needs NPSO help! The bill (HR 3840) was introduced in the US House in November 1989 by Rep. Bob Smith with co-sponsorship by Reps. Wyden and Denny Smith. The same bill was introduced in the Senate by Sen. Hatfield and co-sponsored by Sen. Packwood. This legislation is strongly supported by the NPSO. The chair of the local consensus committee that has developed the proposal over the last two years is our NPSO President Stu Garrett.

This bill would protect 62,000 acres on Oregon's largest volcano from logging and geothermal development. It affords protection to *Botrychium pumicola* (Oregon grapefern), one of Oregon's rarest plants. It preserves five plant communities, from the low elevation riparian areas along the Deschutes River to the subalpine ones at Paulina Peak. It is strongly supported by the largest national conservation organizations and is not opposed by either the geothermal or timber industries.

The bill has been lodged in sub-committee since its introduction. It needs the support of Oregon's full Congressional delegation to see the bill move forward. Write to Reps. Les AuCoin and Peter DeFazio and ask them to co-sponsor this legislation and push for hearings and passage (especially if you live in their districts). It would be appropriate to cite the above features as reasons for support. Ask these influential congressmen to do what they can to prevent the Newberry bill from becoming a victim of partisan politics. Send your letters to The Hon. Les AuCoin/Peter DeFazio, US House of Representatives, Washington DC, 20515, soon!



Rhus trilobata
Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist
University of Washington Press

EDUCATION COMMITTEE ACTIVITIES

Work is beginning on the slide show of Plants of Oregon. The goal is to have a slide show that educates the public about our native plants and relevant conservation issues. The program will include a general explanation about the diversity of plant communities in Oregon, importance of plants, and conservation issues affecting certain habitats. The length of the program will be about 45 minutes. We are looking into the possibility of having the program written so that it can be used as a lesson plan in the school system. The thought is to have one set of slides with different scripts adapted to the age of the audience.

We would like each chapter to gather about 15 slides and write an accompanying script. These slides should include both general photos of plant communities and close-ups of individual plant species. They could be of an area the chapter has worked on as a special project and conservation issues involved in the area. An example for the Willamette Valley would be the loss of the native prairie habitat to agriculture.

GUIDELINES FOR PHOTOS:

- 1) 15 horizontal slides from each chapter.
- 2) Identify plants and plant communities.
- 3) Identify any people in the slides.
- 4) Label picture location and date if possible.
- 5) Name of photographer.
- 6) Select good clear images please.
- 7) Indicate if slides are being donated or need to be duplicated.

Send slides and script to :
Esther McEvoy
3290 SW Willamette
Corvallis, Or. 97333

If you cannot get around to sending the slides and script to me before the annual meeting, just bring them with you to the ANNUAL MEETING!

---Esther McEvoy, Corvallis Chapter

TIMBERLINE: WHAT, WHERE, WHO AND WHY

The following article is adapted from the Winter, 1989 edition of *Kelsey*, newsletter of the Montana Native Plant Society. It was written by Sue Trull.

One of the common native plant growth phenomena is the timberline. Properly speaking, there are two of these barriers to the spread of trees: a lower, drought-induced timberline and an upper, abrupt or transitional timberline. It is this upper boundary which the word connotes for most of us, and which is considered here.

Worldwide, timberline occurs at varying elevations, from over 13,000 ft. in the tropics to near sea level in Alaska. Timberline varies with other factors than latitude, including continentality--timberlines are higher on more inland mountains; aspect--sunny slopes have higher timberlines; and topography--valley heads and passes have lower timberlines while ridges may have higher timberlines than the surrounding mountainsides. Timberline also varies with the species involved, with the occurrence of natural disturbances such as avalanches, volcanic eruptions, gales, fires, insects or disease, and with the activities of man. Despite these local exigencies, the location of timberline correlates well with the 10-degree C. July isotherm, or summer warmth: if the mean July temperature does not equal or exceed 10 degrees C., trees cannot long survive.

There have been many theories attempting to explain timberline, based on cold, shortness of growing season, or harshness of environmental conditions. The actual explanation seems to be a combination of these. Apparently the limited growing season prevents both adequate development of cuticle and abscission scars, and complete lignification of shoots and terminal buds, necessary to resist the desiccation of winter. The short season at high elevations may also not provide sufficient time for ripening, i.e. an increase in cell solutes and a decrease in cellular free water that allows plant protoplasm to tolerate drying. The hardiest conifers are thought to need at least 2 months

without hard frosts in order to ripen. Less hardy species like spruce may need 3 months.

In the northern temperate zone, conifers are the dominant timberline species; in the southern hemisphere and tropics, deciduous trees and tree ferns may form the boundary. These plants exhibit adaptations that help them survive. For example, the typical triangular shape of evergreens easily sheds snow. Alpine larch, which may be the hardest species of all, has flexible branches which spring back after snow loads and bare twigs in winter that are less easily broken by the weight of snow.

Harsh conditions further shape the tree population at timberline. Snow creep may induce 'butt sweep' in trees, where the lower trunk runs parallel to the ground before curving upwards. Wind and ice cause flagging and krummholz--'elfin wood'--formation. In especially severe conditions trees may exist only as cushions, since any projection above the protective snow layer does not survive. In some areas, just below tree limit, ribbon forest/snow glade complexes occur, perpendicular to the prevailing winds. Snow accumulation in the lee of trees prevents seedling growth so that strips of forest alternate with wet meadows.

In fact, there's a tradeoff between the protection against drying and ice-scouring afforded by snowpack and the potential for increased damage from snow molds. There is some evidence that Engelmann spruce and subalpine fir at timberline contain higher concentrations of peroxidase enzymes than their lower-elevation counterparts. These enzymes are believed to help avoid infections by fungi encouraged by long coverage by snowpack.

Clearly, timberline is a complicated and fascinating phenomenon. In winter you can observe the freezing and desiccating conditions which seem to be most responsible, as well as the individual tree responses to these conditions.

THE BRETZ FLOODS: SHAPERS OF COLUMBIAN GEOBOTANY

It seems that on every field trip into the Columbia River Gorge or the lowlands west of the Cascades the subject of the Bretz (or Missoula) floods comes up to explain the scenery, landforms and botany of the area. Well it should, as they gave the lower Columbia River drainage many features which exist nowhere else. Some of these features lead directly to the existence of some of our best wildflower areas which otherwise would be thickly forested and not outstanding floristically as they are now.

The Bretz floods occurred during the waning years of the last ice age, 12,800 to 15,000 years ago. The waters of the Bretz floods were impounded by the repeated advance of a lobe of the cordilleran ice sheet. Behind this ice dam an immense body of water formed. Lake Missoula eventually contained an estimated 500 cubic miles of water. Shoreline erosion from this lake is visible around Missoula, Montana nearly 1000 ft. above the town. For decades the waters of the Clark Fork of the Columbia ponded behind the glacier, until the ice floated. The waters broke the ice loose and started a more than 500 mile journey to a sea then 300 ft. lower than now--a drop of 4500 ft!

The waters initially spread across Eastern Washington, an area originally covered by soft loess (my dictionary gives 3 alternative pronunciations!). The floods took this away, and tore into the hard basalt bedrock. Grand Coulee, Drumheller Channels and many other erosional features here and downstream are referred to as *scablands*. These are areas of rock stripped of its soil cover, with channels, basins, and outcrops all carved in bedrock.

Up to this time the Columbia River followed a typical V-shaped valley at about its present location. The floodwaters are responsible for the present cliffs, waterfalls and many of the wildflowers! The waters, having crossed the broad Columbia Plateau of Eastern Washington, were restricted by the narrow Gorge, and ponded be-

hind Wallula Gap. Waters backed up the Snake and other river valleys, leaving gravel bars bedded to indicate flow up the valleys, the reverse of the direction of the rivers. The waters' elevation at this point was 1250 ft.

In the Gorge itself all loose material was flushed out by the already debris-laden floodwaters, and again the torrent ripped away bedrock, leaving scablands throughout the Gorge. Flood elevations dropped from 1130 ft. at John Day to 700 ft. at Crown Point. Deposits from the floods are visible hundreds of feet up on the walls of the gorge, especially in the treeless eastern end. Tom McCall Nature Preserve was shaped by the floods. The area was overtopped by 200 ft. and stripped of cover down to hard basalt. Cliffs were formed around it and depressions formed, some now filled with water. The area has since remained treeless, allowing the rich display of herbaceous flowering plants we know today.

The flood dropped rapidly into the Willamette Valley. The valley filled to Eugene to an elevation of 400 ft. In the Portland area, several features stand out. An large gravel bar formed behind Rocky Butte, its south edge now known as Alameda Crest. Camassia Preserve was stripped to bedrock as waters sluiced through the narrow Oregon City gap. The cliffs along Lake Oswego were formed, and a debris fan formed east of the lake, extending to Sherwood and rerouting the Tualatin River to its present location. The Clackamas was moved south to the eroded edge of a plateau which stood above the flood. Ice containing rocks from Canada floated across the valley, dropping rocks up to 165 tons at random. Past Portland the waters were not restricted and deposited much of the soil and rock now present.

More information on these events can be found in *The Magnificent Gateway and Calaclysms on the Columbia*.

---Bryan Boyce, Portland Chapter

INTERMOUNTAIN FLORA: THE FABALES

Intermountain Flora is an authoritative series that provides keys, descriptions and illustrations of the plants of the Intermountain Region, which includes all of Utah, most of Nevada, and parts of Idaho, Oregon, Arizona, and California. This area is the largest in the United States without comprehensive floristic coverage.

Volume 3 Part B of this series is now available. It covers the *Fabales*, which includes the Pea family, Mimosa family and Redbud family. Included are chromosome counts, distribution, maps of the region and its floristic divisions, and discussions of the relationships between the 33 taxa in the order within the Intermountain Region. 27 nomenclatural changes are made.

The author is Rupert C. Barneby, a widely recognized authority on the Leguminosae. He has previously published several botanical works in this field. He has been the recipient of several prestigious botanical awards.

Price is \$61.65. Ordering information is available from: Scientific Publications Department
The New York Botanical Garden
Bronx, NY 10458

AROUND THE MOUNTAIN

The Portland Chapter's Annual Flower Show will be at the World Forestry Center Sat. and Sun. June 23rd and 24th. The show features plants from all sides of Mount Hood and various elevations. Columbia Gorge plants are included.

Sensitive plants will be shown in color and slide programs each day. A book display will be near the Information Desk. Helping hands are needed to arrange tables, spread barkdust, fill water containers on Friday June 22nd. All workers will pause at 6pm for a potluck. Cleanup begins about 4:30pm Sunday. Please tell your friends about this beautiful show which is free after admission to the World Forestry Center. For more information call 284-3444.

NEW RELEASE



Rare & Endangered Plants of Oregon

- 8 1/2" x 11" format
- 200 pages, softbound
- Over 350 color photographs
- Text, photo & map for each plant
- Large botanical regional map
- Foreword by Jean L. Siddall
- \$29.95 Plus shipping/handling
- Available in May, 1990

Donald C. Eastman, of our Native Plant Society, has compiled this in-depth color presentation on rare and endangered plants of Oregon that are on the verge of extinction. Many of the plants and flowers photographed and cataloged in this book have never been seen in publication before. Each species is cataloged and indexed according to family, botanical and common name, etc. This book is a must for the casual plant enthusiast, educator or trained Botanist.

For each book purchased, we will donate 10% of the proceeds to the Native Plant Society

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BITS AND PIECES

—News and Information From All Over

COMPOUND FROM PACIFIC YEW FOUND USEFUL AGAINST CANCERS

A complex compound has been found in the bark of *Taxus brevifolia*, our native Pacific yew, which shows promise in the fight against some types of cancer. The compound, taxol, actually stabilizes the outer envelope of cells, making it difficult for cells to reproduce by division. This limits the ability of cancer cells to spread. Work with Taxol has already proceeded to testing on humans, though approval and release of the compound for general use is a few years away. Some side effects have appeared.

This discovery supports arguments for plant species preservation based on the potential to discover beneficial substances in wild plants. Protecting wild species protects a storehouse of potential products of unfathomed promise.

Ironically, once a compound shows value, the plant from which it is derived is put under exploitative pressure. It takes the bark of something like 1500 yews to produce one pound of taxol. Just the demands of research into taxol has created a demand for tens of thousands of pounds of bark from a species of no more than scattered distribution. Taxol is quite complex and complete synthesis is not likely soon. However, it has been found that a relatively simple process creates taxol from yew foliage, rather than bark. Removal of bark, of course, destroys the plants, while pruning twigs for the needles will promote thicker growth and more production. Patents are pending on production of taxol from yew needles, and it is possible that it will reach the marketplace in about three years. Weyer-haeuser is researching growing yews and breeding them for higher yields of taxol. We may yet see our native yew grown in fields like blueberries!



CYANIDE LEACH MINING EIS UPCOMING

The Vale District of the BLM is asking for an Environmental Impact Statement on what may be Oregon's first cyanide leach process gold mine. Conservationists need to show BLM and state agencies involved that we are extremely concerned about strip mining and the cyanide leach process. Write the Vale BLM office to request that your name be on the mailing list for information about the Grassy Mountain EIS and other gold mining activities. Also request that public meetings be held not just in Ontario but also in Portland, Eugene and Bend and that an adequate comment period be given (60 or 90 days, not 15 or 30 as the BLM has been giving). Write: Mr. William Calkins
District Manager, Vale District BLM
PO box 700, Vale Or. 97918 (503-473-3144)

LANDSCAPING WITH NATIVES MEETING

Sat. May 5 the NPSO state subcommittee on Land-scaping with Native Plants will meet. The meeting will be from 9:30 to 11am at the Oregon State Parks office, 525 Trade Street SE, Salem on the 3rd floor. From I-5 take the Mission St. (Hwy. 22) exit towards city center. Proceed 3 miles on Mission, then turn right on Church St. Go past Trade St. and turn left into the parking lot. All who are interested in the subject are invited to attend. For more information, call Sallie Jacobsen (842-4350).

The Mt. Pisgah Arboretum will have their 10th annual Wildflower Show and Sale Sunday, May 20th from 10am to 4pm. The NPSO Emerald Chapter is co-sponsoring the event. The location is in Mt. Pisgah Arboretum in Buford Park off Seavey Loop Road. Botanical exhibits, sales of T-shirts, posters, books, plants and other items, Arboretum tours, music and a slide show of R&E plants are all featured.

Native Plant Society of Oregon Guidelines & Ethical Code

GENERAL GUIDELINE: THINK TWICE. USE DISCRETION. A PLANT IN PLACE IS WORTH TWO IN THE HAND. LOVE THY FLORA.

I. CHAPTER GUIDELINES

- 1) Know your rare, threatened and endangered species. Know your fragile environments and unique biotic communities.
- 2) Be alert to threats to native plants and their habitats. Appoint watchdog committees to keep aware of these threats and inform the chapter.
- 3) Take action to protect native plants. Work with all groups and the general public to protect native plants and their habitats. Be prepared to salvage plants where they are threatened by outright destruction. Help eradicate particularly aggressive and successful exotic plants that threaten native plants. Take responsible outings.
- 4) Educate your members and the public about native plants, and encourage them to use good judgment in the study, enjoyment, and use of native plants.
- 5) Encourage your members to grow native plants only from seeds or cuttings.

II. OUT THERE AMONG THE PLANTS

- 1) Outings for whatever purpose must never endanger a plant population. Encourage nondestructive modes of learning and enjoyment: photography, artwork, scientific description, aesthetic prose and poetry, and so on.
- 2) On group outings (field trips, conservation activities, class field studies), group leaders must take responsibility for protecting native plants from the activities of the group. All participants should understand the goal of plant protection, the purpose of the outing, and the means by which they can make the least impact on plants and the natural habitat.
- 3) Know where endangered species are growing and plan outings with this knowledge in mind.
- 4) Respect private and public property. Do not trespass. Know the regulations for use of the land and natural resources--public or private--your group is entering.
- 5) Respect the habitat as a whole. Avoid disturbing wildlife, such as nesting birds and nesting hornets.
- 6) Be sensitive to the human foot as a threat to plants. Visits to fragile environments should be carefully planned. Students should be given adequate direction by their instructor, and excessive collecting should be discouraged. Better one person enter a fragile area to identify a plant than the whole group.
- 7) Collecting should be considered only when identification cannot be made in the field

or when it will contribute significantly to educational or scientific objectives. Collecting for whatever purpose should be done as inconspicuously as possible. Casual observers may not understand the reasons for collecting and may feel license to do likewise.

- 8) Collecting must never endanger a plant population. Collect seeds or cuttings in preference to whole plants. Do not collect underground plant parts except for identification purposes. Avoid excessive collecting: this calls for exercise of good judgment by the collector. Consider the use of rules of thumb for judging whether to pick or not to pick. Encourage group study of one specimen. Consider using weeds, garden species, or lab-grown specimens for educational purposes.

III. USING NATIVE PLANTS

- 1) Use of native plants--in wildflower shows, plant sales, and horticulture--must never threaten their populations.
- 2) Native plant species for sale should be obtained by salvage, seeds, or cuttings--in that order of priority--and whole plants should never be dug up, except for salvage. Seeds should not be sold. Growers must exercise discretion in collecting seeds and cuttings to avoid endangering plant populations.
- 3) Native plants for sale should state on the label how obtained or grown. Chapters should consider certifying commercial growers who follow good ethical practice, and should urge the public not to buy unless plants were obtained or grown according to these guidelines.
- 4) The sale and use of particularly aggressive and successful exotic plant species, such as gorse, broom, and pampas grass, should be discouraged.
- 5) Salvage of native plants should be encouraged when their destruction is certain: at quarries, mines, dams, building construction sites, road construction sites. Salvage is not necessarily called for, however, on logging sites, some recreational areas, and rangeland. Salvaged plants should be kept potted long enough before sale to ensure that they will survive the shock of transplant.
- 6) Wildflower shows should make maximum use of their educational potential. Inform the public of the goals of NPSO: explain the guidelines your chapter follows in studying, enjoying, and using native plants--including guidelines followed in collecting for the show; consider using all other educational options (slides, artwork, publications, herbarium collections, news media, etc.); and continue the educational "life" of display materials after the show by donating them to schools, libraries, or other constructive uses.

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GUIDELINES FOR CONTRIBUTORS

The *NPSO Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome. **Deadlines:** Copy is due with the editor by the 10th of the month. **Text Format:** Submission can be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in long, with spacing between columns .22 in. The *Bulletin* uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted into their favorite field guide. **Computer Disks:** The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details. **Illustrations:** Line drawings are preferred to pictures requiring half-tone reproduction. Contact the editor about our current needs. **Credits:** If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underlining if italic is not available). **Return of Originals:** Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all. Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
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 If so, please write your Old Address here: _____
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* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New	() Renewal	() Quarter Membership (Sep.-Dec.) \$3.00	() <i>Bulletin</i> Subscription only \$12.00
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To increase the knowledge of members and public in identification
and conservation of the native plants of the Pacific Northwest

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

14 July, Sat.

FIELD TRIP to the Tucannon River north of Dayton, Wa. Leader, Karl Urban. Leave at 8am from the BMCC Greenhouse in Pendleton. For information call Bruce Barnes (276-5547).

Corvallis

11 June, Mon.

MEETING. 7:30pm in Room 4083, Cordley Hall, OSU, Corvallis. A talk on "Forest Plants of Cameroon" by Duncan Thomas.

16 June, Sat.

FIELD TRIP to Mary's Peak. Leave at 9am from the parking lot across from the Monroe St. Beanery, Corvallis. Bring rain gear, lunch & hiking clothes. Contact Esther McEvoy (754-0893) for further info.

14 July, Sat.

FIELD TRIP to Iron Mountain. Leave at 8am from the parking lot across from the Monroe St. Beanery, Corvallis. Bring rain gear, lunch & hiking clothes. Call leader Dan Luoma (758-8063) for more info.

Emerald

11 June, Mon.

For more information on field trips, call Sally Claggett at 484-0199.

MEETING. 7pm at the Westmoreland Community Center, 1545 W. 22nd. George Atiyeh will speak on Opal Creek.

High Desert

14 July, Sat.

FIELD TRIP to Iron Mountain. One of Oregon's classic wildflower hikes, located just north of the Santiam Highway. A moderate 2 mile hike each way on a good trail with 1500 ft. elevation gain. Please call trip leader to register. Trip leader: Marge Ettinger (382-2255).

Mid-Columbia

6 June, Wed.

MEETING. 7:30pm at the Mosier School. Cheryl McAffrey, State Office botanist for the BLM, will give us an overview of the BLM's Botany Program.

1 Aug., Wed.

MEETING. 7:30pm at the Mosier School will be a very special guest: Dr. Robert Pyle, leading authority on butterflies of the Pacific Northwest, speaking about "Butterflys: Flying Flowers". This is one program you won't want to miss! More about it in next month's *Bulletin*!

North Coast

2 June, Sat.

FIELD TRIP to Yaquina Head. Leave at 9:am from the PUD parking lot in Tillamook. Bring lunch & water. The BLM will give us a tour of Yaquina Head. For information call Al Krampert (842-2308).

7 June, Thurs.

MEETING. 7pm, meet at Tillamook Bay Community College Parking lot. We will carpool to the Rainforest Nursery where Joan Saeger will give a tour of the nursery and talk on propagating native plants.

Portland

2 June, Sat.

FIELD TRIP to Badger Creek. We will botanize along the School Canyon Trail on a ridge above the creek, in open grasslands, and pine-oak woodlands. Leave at 7:30am from the K-Mart parking lot at NE 122nd and Sandy. Leader: Rick Brown (222-1146).

9 June., Sat.

ANNUAL MEETING. No field trip! See you at the meeting!

12 June, Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Linda McMahan, Executive Director of Berry Botanic Garden, will give a slide presentation on native plants being preserved at botanical gardens throughout the United States while she was director of Botanical Garden Programs at The Center for Plant Conservation.

16 June, Sat.

Friends of the Columbia River Gorge hiking weekend. We are offering a 6.5 mile **FIELD TRIP** on the Pacific Crest Trail from Ft. Rains past Gillette Lake to Greenleaf overlook. Leave at 8:30am from the DOT parking lot near 60th and Glisan or 9:30am at the Ft. Rains Historical Marker 1 mile west of the Bridge of the Gods on Washington SR 14.

23 June, Sat.

AROUND THE MOUNTAIN annual flower show of the Portland Chapter of the Native Plant Society of Oregon Saturday and Sunday June 23rd & 24th at the World Forestry Center. No field trip.

30 June, Sat.

FIELD TRIP to Falcon Valley, visiting Laurel Rd., Willard Springs and/or the upper Klickitat River. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot. Leader: Mike Fahey (206-694-2902).

Siskiyou

2 June, Sat.

FIELD TRIP to Babyfoot Lake. Anita Seda, botanist for the Galice and Illinois Valley Ranger Districts of the Siskiyou National Forest, will lead a field trip to Babyfoot Lake Botanical Area. This glacial cirque lake is just inside the Kalmiopsis Wilderness. We will be looking for *Lewisia* species as well as enjoying this picturesque lake. This will be a 3 to 4 mile round trip on trails with some off trail browsing. Meet at Medford K-Mart at 8am or in Selma at the Selma Market at 9am. Info. John Erwin (476-2462).

14 June, Thur.

MEETING. 7:30pm in Rm. 171, Science Bldg, Southern Oregon State College. Joan Sievers will speak on current sensitive plant monitoring in the Medford District BLM. Her talk will be accompanied by exciting new slides and results of the monitoring.

16 June, Sat. **FIELD TRIP** to Round Top Butte Preserve. Darren Bergias of the Nature Conservancy will lead a hike at Round Top Butte Preserve and proposed research natural area. Rouge Valley lowland plant communities and early summer wildflowers will be seen. The hike will emphasize native grasses and fire ecology. Meet at Medford BLM, 3040 Biddle Road (one mile south of Medford Airport) at 9am. For info. call 482-8196. (Difficulty: moderate.)

23 June, Sat. **FIELD TRIP** to Miller Lake. Barbara Mumble of the Applegate Ranger District will lead this hike on Oliver Matthew's Trail to Miller Lake. Unusual species we will see are Brewer's Spruce, Matthews Cypress, Sadler Oak, and *Ribes marshallii*. Meet at 8:30am at the Williams Hwy. Safeway or at 9am at the town of Applegate, in the parking lot of the park. Info. John Erwin (476-2464). (Difficulty: Easy to moderate.)

Umpqua Valley

21 June, Thurs. **MEETING.** 7pm at the BLM Office, 777 NW Garden Valley Blvd., Roseburg. Russ Holmes will speak on the Roseburg BLM rare plant program.

30 June, Sat. **FIELD TRIP.** *Calochortus coxii* and other rare plants occurring on the BLM's Roseburg District. Leader: Russ Holmes (672-4635). Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg.

Willamette Valley

If you want to hear about unscheduled mid-week trips to places near or far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).

2 June, Sat. **FIELD TRIP.** for rare and endangered plant monitoring in Polk and Yamhill counties. This will be an opportunity to take part in the state-wide NPSO R/E project and help "count noes" to determine the current status of these plants. Mostly drive-by surveying with little walking. Leave at 8am from South Salem K-Mart. Leader: Wilbur Bluhm (393-2934).

9 June, Sat. **FIELD TRIPS** in conjunction with the NPSO Annual Meeting. Plan to attend!

16 June, Sat. **FIELD TRIP** to the Metolius River. A stop at the headwaters of this famous river, the follow the River Trail downstream from Bridge 99. Approx. 4 mi. round trip, easy walking. You MUST call trip leader Jim Versaeg (363-7397) or Barbara Halliday (371-1025) if you plan to attend.

24 June, Sun. **FIELD TRIP** to the the Valley of the Giants, Oregon's largest known stand of record-size Douglas firs. In the Coast Range, 60 mi. west of Salem. Leader: Larry Scofield (787-3833, Dallas). Leave 8am from South Salem K-Mart or 9am from City Hall, Falls City.

16 June, Sat. **FIELD TRIP** to Whetstone Mountain, in the Little North Fork of the Santiam River drainage. A long and strenuous loop, 8-9 mi. total. First 2 mi. uphill, then a gradual hike down via Opal Creek area. Leave 8am from South Salem K-Mart. Leader: Tom Cherick Jr. (284-5156, Portland) or in Salem, call Barbara Halliday (371-1025).

7 July, Sat. **FIELD TRIP** to a wetlands area near I-5 and Highway 22 in Salem. A new area for us--come explore! Leave 8am from South Salem K-Mart. Leader Dale Groff (223-6808, Portland) or in Salem call Barbara Halliday (371-1025).

William Cusick

For information, contact Karen Antell (963-0267).

ANNUAL MEETING AND STATE BOARD MEETING
SATURDAY AND SUNDAY, JUNE 9TH AND 10TH
AT BAKER'S BAR M RANCH, ADAMS, OREGON

All NPSO members are invited to attend the State Board meeting which will be held in conjunction with our Annual Meeting June 8th thru 10th at the Bar M Ranch 31 miles east of Pendleton.

Following the dinner which begins at 6:30pm Saturday, we will have Chapter Reports, a Membership Report, Awards, Swearing in of new officers (see accompanying article on new officers), announcements, and our main speaker.

Beginning at 9am Sunday, we will have a regular business meeting of the Board. All voting members of the Board including new officers and Chapter presidents should plan to attend.

All Board members should bring their copy of the minutes of the January 27th meeting in Eugene, which was mailed to you February 24th. By now you should have received a preliminary agenda. If you have last-minute agenda items, please call them in to Secretary Rhoda Love (345-6241) as soon as you read this, so that she can make up a revised agenda.

See you all at the meeting!

Rhoda Love, NPSO Secretary

NEW STATE OFFICERS CHOSEN

The following individuals will take office June 9th at the NPSO Annual Meeting:

President: Stephanie Schulz
Vice President: Dr. Dan Luoma
Secretary: Sue Vrilakas
Directors at Large: John Christy
Tom Kaye
Kathy Schutt

We extend our thanks to all who ran for office and those who serve as committee chairs. All the outgoing officers deserve a hearty round of applause for their efforts this past year!

The name chose by the membership for NPSO's occasional publication is *Kalmiopsis*. Rhoda Love is winner of a copy of *Northwest Trees*.

---Margary Willis and Mary Anne WestFahl,
NPSO 1990 Election Committee

**NEW MAILING COMMITTEE NEEDED
FOR NPSO BULLETIN**

The NPSO has lost its *Bulletin* Mailing Committee. Sara Barnum, longtime former Mailing Committee head, has generously offered to temporarily keep the *Bulletin* rolling out, but cannot do so for long. A new Committee needs to be found soon. One person willing to assist the operation but not direct it may be available. Two experienced mailers are willing to help train a new Committee Chair and assist at first.

This is a job for two people once a month. It entails picking up the newsletters at the printer in SE Portland, placing computer-sorted labels on them, and taking them to the Postoffice. This should take several hours total for the 750 or so mailed each month.

Interested? Contact Sara Barnum at 639-3353.

KALMIOPSIS: THE JOURNAL

The NPSO membership has selected the name of Oregon's own endemic ericaceous shrub genus to serve as the title of our annual journal. Our current plans for the magazine-style journal is to have an October 1990 deadline for manuscripts with publication planned for midwinter of 1991. Though there are still many decisions to be made (selection of a printer, who will handle mailings, subscriptions, and advertising, how will we produce camera ready copy), the editorial committee of Stu Garrett, Susan Kephart, Rhoda Love and Frank Lang feels confident that we can produce a magazine that the society can take pride in.

We plan to have articles on endangered plants, plant identification, botanical history, and newly described Oregon plants, among other topics. At this point we are inviting authors to submit articles. As a matter of policy we will not publish any article describing new taxa or nomenclatural changes, until the botanical changes have been published in an appropriate publication.

Please address any comments, ideas, offers of help, etc., to:

Frank A. Lang, 535 Taylor St., Ashland, OR 97520. (503)-482-5235H or 482-6341W.

OLD GROWTH FORESTS: TREASURE IN TRANSITION

This new exhibit has been widely praised for its impact and balanced handling of its controversial subject. The World Forestry Center staff created the 6,000 sq.-ft. exhibit to give an objective view of management of our remaining old growth forests. The multimedia show uses photographs, a slide presentation, dioramas, models and specimens from the forests. It defines old growth itself, examines forest succession, forest ecology, forest uses, and discusses the economic and environmental impact of future management options. It goes on an American and Canadian tour after finishing its Portland run Nov. 4.

AROUND THE MOUNTAIN Portland Chapter's Annual Flower Show at The World Forestry Center June 23rd and 24th

This year Mt. Hood and nearby areas have been chosen as the focus of the Portland Chapter's annual flower show. Exhibits and slide shows will center on the flora of Mt. Hood and the Columbia River Gorge. The show will run from 10am to 5pm each day. It is free after admission to the WFC. The well-received "Old Growth Forests: Treasure in Transition" exhibit can be seen at the same time (see accompanying article). WFC admission is \$3 for Adults and Seniors and Students \$2, with WFC members and children under 6 free. Additional parking will be available at the Sylvan Exit with shuttle buses to the WFC, OMSI (new dinosaur exhibit!) and the zoo. Address is 4033 SW Canyon Blvd. For more information call 228-1367.

Slide Show Schedule for "Around The Mountain"

SATURDAY JUNE 23rd

10:30am--Plants of Seeps, Hanging Surfaces, and Other Wet Places--Bonnie Brunkow
11:30am--Native Plants From Paradise Park to Eden Park--David Dobak
12:30pm--Heath Family and Other Flora of Mt. Hood--George Lewis
1:30pm--Native Plants From Paradise Park to Eden Park--David Dobak
2:30pm--Wildflowers from the Gorge to Mt. Hood--Mike Fahey

SUNDAY JUNE 24th

11:30am--Flowers on the Columbia Gorge Side of Mt. Hood--Vance Terrall
12:30pm--Heath Family and Other Flora of Mt. Hood--George Lewis
1:30pm--Flowers within the Mt. Hood Loop--Carroll Dubuar
2:30pm--Wildflowers from the Gorge to Mt. Hood--Mike Fahey
3:30--Timberline Flowers on Mt. Hood--Bryan Boyce

THE GENUS LEWISIA - A REVIEW

The Genus Lewisia, by Brian Mathew. Timber Press, Portland, Or, 1989. 151 pgs. \$29.95.

It seems remarkable that an important new taxonomic treatment of a genus of attractive plants of the Western United States should be written by a British horticultural authority. Such is the situation with *Lewisia*, whose classification hasn't been revised by an American botanist since 1932.

As revealed in this fine book by Brian Mathew, *Lewisia* species have been cultivated in Europe, especially Britain, since very early in this century. In the 1930's F. W. Millard, West Sussex, England, was cultivating and hybridizing some 8 species of Western American lewisias, winning many prizes with his creations at garden shows of the Royal Horticultural Society. The ease with which *Lewisia* species under cultivation can be cross-fertilized to give spectacular hybrid forms has endeared the genus to rock garden enthusiasts in Europe and the United States.

This book is beautifully illustrated with water-colors of some 13 cultivated *Lewisia* species done by Christabel King, numerous photographs of flowering specimens taken in their natural habitats, and line drawings showing floral details of many of the species. The book's introductory chapters cover, in relatively brief format, such subjects as the history of the genus, the morphology of the plants, their pollination, and their cytology. One chapter covers the techniques for pot cultivation of the various species, providing useful guidelines for anyone interested in growing lewisias as a hobby. With a few exceptions, according to Mr. Mathew, the species can be grown in "2 parts peat and 1.5 parts grits, plus a good slow-release fertilizer".

The main body of the book consists of a taxonomic treatment of the genus, with the illustrations mentioned above, distribution maps, and a bibliography of taxonomic & horticultural references. In this revision, 19 spp. are recognized, plus 2 natural hybrids (*L. leeana* x *L. cotyledon*, and *L. triphylla* x *L. nevadensis*), and a long list of garden hybrids and named cultivars.

The species are arranged in 2 subgenera (Subgenus *Strophium* for *L. tweedyi*, subgenus *Lewisia* for the remaining species); the latter subgenus is divided into 6 sections (five of these being newly named by Mathew). Species most familiar to Oregon botanists will no doubt be the succulent, evergreen *L. columbiana*, *L. cotyledon*, *L. tweedyi*, and *L. leeana*. The Bitterroot, *L. rediviva*, is of course familiar to all; *L. oppositifolia*, *L. triphylla*, *L. pygmaea*, and *L. nevadensis* are deciduous species that will be known to botanists who have hiked the mountains of the state. The geographical of many other taxa, especially in the Sierra Nevada of California, is very localized—to the extent that some probably should be assigned the status of rare or endangered. No fewer than 10 species appear to have restricted distributions of this type. In his single paragraph chapter on "Conservation", Mathew states "...there is no excuse for digging up *Lewisia* plants on a large scale, even in the case of the relatively common and widespread species". In Oregon it would seem good advice not to dig these plants in nature under any circumstances, lest the pressure of collecting for horticulture push more species towards extinction.

The map of distribution given for the genus as a whole (page 38) omits large areas of the range of *L. rediviva*, and does not even match, in detail, the maps given for other individual species. The basemap of California in the taxonomic section strangely omits the San Joaquin River and its tributaries in the Sierra Nevada; this makes it difficult for the reader to assign the marked occurrences of six species with any accuracy.

This book is highly recommended; it provides a useful summary of the classification of *Lewisia* species, and, most importantly, it is very attractively illustrated.

---Kenton Chambers, Corvallis Chapter

1990 NPSO BUDGET

(January 1 – December 31) Adopted by the
Board of Directors, January 27, 1990.

Estimated Income:

Membership dues	\$10,000.
Environmental Federation of Oregon	5,000.
R/E Fund	500.
Interest	300.
Notecards	300.
Posters	500.
Sub-total	17,600.
Balance brought forward	5,985.
TOTAL INCOME	\$22,585.

Anticipated Expenses:

Bulletin	\$4,750.
Environmental Federation of Oregon	3,500.
Chapters share of dues @ 35%	3,500.
Occasional Papers, start up	2,500.
Research Grants (4 @ \$400.)	1,600.
New Notecards	900.
Posters	720.
Board and other committees	600.
R/E (incl. 1 \$400 grant)	500.
Conservation committee	450.
Roster	400.
President	400.
Secretary	300.
Legislative committee	200.
Membership chair	200.
Annual meeting—Banquet speaker	200.
R. & E. Species Conf.	100.
ONRC	100.
Nat. Res. Def. Council	100.
Brochure	100.
Fees and Taxes	80.
Treasurer	70.
Desert Conference XII	50.
Natural Areas Association	25.
Walker Creek Wetlands	25.
Wildflower Research Center	25.
Sub-total	21,395.
Balance Forwarded (savings)	1,190.
TOTAL EXPENSES	\$22,585.

State board members and committee chairs attending state board meetings are reimbursed for mileage over 100 miles per meeting (non-cumulative) @ 21¢/mile.

ENVIRONMENTAL FEDERATION OF OREGON

The beginning of the 1990's marks two milestones in the evolution of NPSO. First, we will reach the \$10,000 level in membership dues. This is due to increasing membership and a slight increase in rates. We are able to continue improving the *Bulletin*, provide support to research projects, and start a botanical journal.

Secondly, we have joined a fund raising group which promises to be a major source of income in the years ahead. The Environmental Federation of Oregon (EFO) is an umbrella organization whose purpose is to raise money for environmental groups in Oregon. The Federation's primary fund-raising tool is workplace solicitation, or payroll deduction plans, similar to the way United Way represents health and human services organizations.

Most employee pledge campaigns are limited to umbrella groups like EFO. When an employer grants permission, the Environmental Federation of Oregon will run a campaign alongside United Way and other umbrella groups. Contributions may be designated to one or more organizations or left undesignated. The Nature Conservancy, Oregon Rivers Council, Portland and Salem Audubon Chapters, Oregon Trout, Sierra Club Foundation, 1,000 Friends of Oregon, OSPIRG Education Fund, The Wilderness Society, Northwest Coalition for Alternatives to Pesticides, Oregon Natural Resources Council, Northwest Environmental Advocates, Headwaters, and the Oregon Environmental Council comprise the rest of EFO's membership.

Our initial dues to EFO were \$1,000, which covered participation in the fall Combined Campaign for State of Oregon and Multnomah County employees. The campaign was an unparalleled success and our share of the proceeds will be about \$5,000. In order to

establish a solid foundation for EFO's growth into more work-sites, an increase in dues was necessary.

Last year was a fall-only effort with a 1/2 time coordinator. With a full-time coordinator and a half-time assistant, EFO is poised to greatly expand efforts to gain access to payroll deduction campaigns. NPSO members can help in several ways: 1) become involved in our EFO committee (each chapter will need to have at least one member) — we are required to contribute 100 hours per year towards EFO's efforts, 2) ask your employer to consider including EFO in a payroll deduction plan, 3) if you already have the opportunity to contribute through EFO, write to the head of your organization (e.g. the governor) and express your appreciation for having the choice.

The main demographic target for EFO seems to be people who are not members of environmentally oriented organizations but want to contribute towards improving the environment. One thing must be made clear — contributions through EFO can not be used to obtain or renew membership in NPSO. There was some unanticipated confusion this year about the status money designated to NPSO through EFO. EFO simply raises funds for its member organizations and is not involved in membership activities. Our society is chapter based and member oriented. By joining EFO we are able to participate in fund raising without losing our grass roots character. Hopefully, we will eventually raise enough money to hire a part-time person to help with many of the time consuming tasks such as putting out the *Bulletin* and maintaining the rare plant database.

Our all volunteer organization is overwhelmed keeping up with a growing organization as it is. The payroll deduction process is an unwieldy way to track membership and we receive only the names of those who requested acknowledgement. Thank-you to all who contributed; and because of the confusion, those who requested acknowledgement (and donated enough money) will be given vouchers for next years membership. In the future, all contributions through EFO will be considered over and above membership dues. All memberships must go through Mary Falconer.

NPSO Funds Research

The Leighton Ho Memorial Field Botany Award has been linked with matching funds from The Nature Conservancy to increase the effectiveness and stature of the award. This year, research carried out under the award will attempt to locate and survey all populations of *Silene spaldingii* (Spalding's catchfly, pink family — Caryophyllaceae) on Clear Lake Ridge in Wallawa County where TNC recently acquired a 3,560 acre preserve. The Clear Lake Ridge Preserve was originally identified for the protection of unique mid-elevation freshwater playa lakes which contain the only known greater yellowlegs nesting site in Oregon.

Silene spaldingii is a regionally endemic plant, restricted to the palouse grasslands of Oregon, Washington (18 sites), Idaho (1 site), and western Montana (6 sites). In Oregon, there were a number of historical collections made by William Cusick between 1890 and 1910. In 1980, Bonnie Heldell relocated one of Cusick's sites by Wallawa Lake. Jimmy Kagan of the Oregon Natural Heritage Program located ten new populations in 1989. Oregon populations are restricted to the Wallawa Valley area and occur in two plant associations. Most sites are in the Idaho fescue-junegrass association (*Festuca idahoensis*-*Koeleria cristata*). A few sites are in a rare prairie sagebrush/Idaho fescue (*Artemisia ludovicica*/*Festuca idahoensis*) community. Throughout its range, only 3 populations of *Silene spaldingii* have more than 100 plants.

This year's study (under the direction of Berta Youtie, TNC Land Steward for eastern Oregon) will also focus on aspects of flower and seed production. Predation of flowers and capsules may be a major factor limiting population size because *Silene spaldingii* does not spread vegetatively. [Thanks to Berta for providing the information used in this article.]

NPSO's Rare and Endangered Plant Fund is providing financial support to Thomas Baxter so that he can participate in a study of *Thelypodium eucosmum* (Arrowleaf thelypody), a candidate

for State and Federal listing as a Threatened species. *Thelypodium eucosmum* is restricted to Wheeler, Grant, and Baker counties where it is found on dry slopes in the Juniper-sagebrush (*Juniperus occidentalis*/*Artemisia tridentata*) series of plant communities. The work will involve a comprehensive search for populations of the species over approximately 10,000 acres in the BLM Prineville District. After potential sites are identified from aerial survey by helicopter, ground searches will be made. Once populations are located, observation and careful documentation of the number of individuals, age structure of the population, phenology, associated species, habitat, pollinators, and seed predators will be made. The study is being guided by Bob Meinke, program leader of the Conservation Biology Program, Oregon Department of Agriculture and lead in the field by Tom Kaye, staff botanist. The BLM Prineville District is providing critical logistical support, particularly helicopter time. By covering the expenses for a student such as Thomas, NPSO allows him to gain valuable experience with professional botanists while his help increases the effectiveness of the survey. Bob Meinke and NPSO encourage interested individuals to initiate study proposals or inquire about participating in Oregon Department of Agriculture, Conservation Biology Program surveys with the help of an NPSO grant.

NPSO grant support is not limited to studies of rare plants. Dr. Charles Halpern, a postdoctoral research associate with the Forest Science Department at Oregon State University, has received support to purchase materials for his study of species interactions during secondary succession. The study site will be chosen from one of seven mature to old-growth Douglas-fir stands in the Blue River Ranger District, Willamette National Forest that are scheduled to be clearcut this summer. Specifically, the study will determine to what extent and in what manner the native species, *Epilobium angustifolium* (Fireweed), and the introduced species, *Senecio sylvaticus* (Woods groundsel), interact to influence successional dynamics. The second part of the study will look at the effects of *Rubus ursinus* (Pacific blackberry), *Ceanothus velutinus* (Cinnamon bush), and *C. sanguineus* (Redstem ceanothus) (all native species) on the develop-

ment and structure of the plant community. Previous studies (initiated in 1962 at the nearby H. J. Andrews Experimental Forest and the subject of Dr. Halpern's thesis under the direction of Dr. Jerry Franklin) show that these species are among the most important to dominate a site during early stages of succession in the Western Cascades.

The study will be carried out by removing different combinations of the target species from test plots and recording the response of the remaining species. Results from the study will show us the effects of competition between *Epilobium angustifolium* and *Senecio sylvaticus*. On a broader scale, we will see how the plant community responds to removal of key species of different life-form, history of origin in the community, and duration of importance in the community. Given that vast tracts of our landscape are destined to experience cyclic logging, this study should explain a great deal about the composition of plant communities we usually pass by on the way to field trip sites.

Malheur Field Station, in conjunction with the BLM Burns District, is creating a *Flora of Steens Mountain*. The first phase will be publication of a short version of the flora arranged according to ecological zones. It will be part of a nature guide series to Steens Mountain published by the BLM and should be available within two years. The complete *Flora*, to be published at a latter date, will include more information such as biogeographic relationships and maps. NPSO approved financial support for this project several years ago. This summer our support will enable Dr. Don Mansfield (College of Idaho), Ruth Moorhead, and Karl Holte (both of Idaho State University) to begin the final phase of field work and data entry. Karl Urban (Blue Mountain Community College) and Lucile Housley (Director of the Malheur Field Station) are also involved with the project.

Steens Mountain is recognized as a center of endemism; for example *Castilleja steenensis*, *Cirsium peckii*, and *Eriogonum chrysops* occur only there, and is noted for its geographically isolated (disjunct) populations of species more common to other regions.

BITS AND PIECES

—News and Information From All Over

LETTERS TO THE EDITOR

From: Sarah E. Greene
Research Natural Area Scientist
Pacific Northwest Region, USFS

Dear Mr. Boyce:

I read with some dismay Rhoda Love's article "We Cannot Relax Our Efforts to Save Oregon's Redwoods" (NPSO *Bulletin*, Vol 23, #4). She states, based on personal experience, that the usual management practice regarding Research Natural Areas (RNAs) is to log all around them, and then salvage any resulting windthrow. There are, indeed, clear-cuts adjacent to Forest Service RNA boundaries in Oregon, but I know of no RNA that has clear-cuts around its entire boundary. As for salvage, the Forest Service policy states in its manual that no salvage can occur in an RNA. If a tree happens to come down across a trail or road, it may be removed to allow passage, but any portion of the tree within the RNA boundary must remain on the ground. The same is true for danger trees; they may be felled but must be left in place, i.e. not removed.

The Research Natural Area program needs all the help and support it can get. The program is poorly funded and generally not well understood or accepted by managers. I might add Chetco Ranger Michael Frazier is one notable exception. Misinformation like Ms. Love's only alienates managers further and makes the program appear useless in the eyes of the public. NPSO's support, including Ms. Love's, for the RNA program has been and is important. But incorrect information expressed in outrage is not at all helpful.

-- A N D A R E S P O N S E
FROM RHODA LOVE

Bryan Boyce called me last night and told me that you had taken exception to a statement in my article "We Cannot Relax our Efforts to Save Oregon's Redwoods". Bryan read me your letter and I thought it sounded excellent. I had to go back and read my article, and I do agree that shouldn't have used the phrase "the usual practice" is to

log up to RNA boundaries. I should have said that I have seen instances where logging appears to be in this pattern. The folks at ONRC, who have been protesting such timber sales, have aerial photos which show some BLM RNA's in Western Oregon with only a single timber stand remaining before they would be islands in a clearcut sea. And, as you know, I have been most upset to see this pattern of logging at the Elk Meadows RNA where I have done some of my research.

I also inadvertently left out an important clause when I failed to write that when the major features of an RNA are destroyed, the RNA may be removed from protected status and then salvage could proceed. As I'm sure you know, from past correspondence we have had, I am a strong supporter of the RNA concept and only wish we could have more of them and that they could be larger with more protected buffer areas around them. When I wrote the piece in question it was at a time when certain forces were calling for weakening of the Endangered Species Act and for logging in Wilderness Areas and National Parks. I had also recently heard from sources within federal agencies that attempts were being made to weaken protection for RNA's. So, although I may have done it somewhat clumsily, I was hoping to improve the awareness of our members that once established, an RNA would not necessarily remain protected unless the public kept an eye on it to be sure its values did not become eroded.

I very much appreciate the hard work you have done over the years to get these areas established. And, in fact, I have just recommended to the Lowell District of the Willamette National Forest that Patterson Mountain Prairie be set aside as a Botanical RNA, and it looks as though that idea may move forward, which pleases me very much.

Basically, I feel sure that you and I are on the same side. I appreciate your writing to the *Bulletin* to correct my faulty wording. Please put my poorly chosen phrases down to a hasty response which was in no way intended to be a negative judgement against the RNA concept which I wholeheartedly support.

STATE OFFICERS

DIRECTORS.....	Jerry Igo, Nancy Fredricks, Paula Brooks, Barbara Mumblo, Marjorie Willis
PRESIDENT.....	Stu Garrett..... 21663 Paloma Drive, Bend 97701; 389-6981
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VICE PRESIDENT.....	Elizabeth Handler..... 4712 SW Iowa, Portland 97221; 244-5320
SECRETARY.....	Rhoda Love..... 393 Ful Vue Dr., Eugene 97405; 345-6241
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LITERATURE.....	Eather McEvoy..... 3290 Willamette, Corvallis 97333; 754-0893
MEMBERSHIP.....	Mary Falconer..... 1920 Engel Ct. NW, Salem 97304; 585-9419
WILDLIFE/PLANT POSTERS.....	Susan Gubay..... P. O. Box 151, Mosier 97040; 478-3576
NOTECARDS.....	Nancy Fredricks..... 34213 Riverside Dr. SW, Albany 97401; 967-1893

CHAPTER PRESIDENTS

BLUE MOUNTAIN (Pendleton).....	Bruce Barnes..... 731 NW 5th, Pendleton 97801; 276-5547
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EMERALD (Eugene).....	Diane English..... 3383 West 14th, Eugene 97402; 484-9287
HIGH DESERT (Bend).....	Bill Hopkins..... Silvicultural Lab, Bend 97001; 388-7426
MID-COLUMBIA.....	Keith Chamberlain..... Box 271, Mosier 97040; 478-3314
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UMPIQUA VALLEY (Roseburg).....	Russ Holmes..... 322 Anacapa Drive, Roseburg 97470; 672-4635
WILLAMETTE VALLEY (Salem).....	Mary Anne Westfall..... 2375 Madrona Lane, Canby 97013; H-266-7967
WM. CUSICK (LaGrande).....	Karen Antell..... Biology Dept., EOSC, LaGrande 97850; 963-0267

BULLETIN

EDITOR.....	Bryan Boyce..... 13285 S. Clackamas River Drive, Oregon City 97045-9411; 655-4457
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GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Submission is to be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in. long, with spacing between columns .22 in. The *Bulletin* uses 10 point "Geneva" font.

Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings are preferred to pictures requiring half-tone reproduction. Contact the editor about our current needs.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Names: Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available). *Return of Originals:*

Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Is this a change of address? _____
 Address _____ If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
 Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () *Bulletin* Subscription only \$12.00

() Student.....\$ 8.00 () Sustaining.....\$ 30.00
 () Regular.....12.00 () Patron.....100.00
 () Family Membership.....18.00 () Life Member.....500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund..... \$ _____
 Leighton Ho Memorial Award Fund..... \$ _____
 Rare and Endangered Plant Fund..... \$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Send change of address notices to:
Native Plant Society of Oregon
Mary Falconer, Membership Chair,
1920 Engel Court NW,
Salem, Oregon 97304



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Permit #2432



Bulletin of the
NATIVE PLANT SOCIETY OF OREGON

Dedicated to the enjoyment, conservation,
and study of Oregon's native vegetation

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

14 July, Sat.
the

FIELD TRIP to the Tucannon River north of Dayton, Wa. Leader, Karl Urban. Leave at 8am from BMCC Greenhouse in Pendleton. For information call Bruce Barnes (276-5547).

Corvallis

14 July, Sat.

FIELD TRIP to Iron Mountain. Leave at 8am from the parking lot across from the Monroe St. Beanery, Corvallis. Bring rain gear, lunch & hiking clothes. Call leader Dan Laoma (758-8063) for more info.

Emerald

7 July, Sat.

FIELD TRIP to Patterson Mountain in the Lowell Ranger District. Leave at 10am from the South Eugene High School lot. Leader: Jennifer Dimling (343-3242).

High Desert

14 July, Sat.

FIELD TRIP to Iron Mountain. A joint outing with the Portland Chapter. One of Oregon's classic wild flower hikes, located just north of the Santiam Highway. A moderate 2 mile hike each way on a good trail with 1500 ft. elevation gain. Please call trip leader Marge Ettinger (382-2255) to register. .

Mid-Columbia

11 July, Wed.

MEETING. 7:30pm at the Mosier School. David Craig, student at Lewis & Clark College and intern at the Berry Botanic Garden, will present a slide show on "Rare and Endangered Plants of Oregon".

1 Aug., Wed.

MEETING. 7:30pm at the Mosier School will be a very special guest: Dr. Robert Pyle, leading authority on butterflies of the Pacific Northwest, speaking about "Butterflies: Flying Flowers". This is one program you won't want to miss!

North Coast

- 5 July, Thurs. **MEETING.** 7pm at State Office Building, 3600 3rd St., Tillamook. Bring plants&flowers to discuss.
- 7 July, Sat. **FIELD TRIP** on Lake Meares by canoe. For information call Al Krampert (842-2308).
- 21 July, Sat. **FIELD TRIP** to Saddle Mountain. Difficult uphill, but well worth it. 5 mile total distance. Leave 9am from the Cornet parking lot. For information call Al Krampert (842-2308).

Portland

- 7 July, Sat. **FIELD TRIP** to Table Rock. This showy area is noted for a wide range of plant habitats, spectacular columnar basalt cliffs, and views from Three Sisters to Adams and the Coast Range. About 5 miles round trip. Leave at 8am from the K-Mart parking lot at SE 82nd and Milwaukie Expressway. Leader: Bryan Boyce (655-4457).
- 10 July, Tue. **MEETING.** 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. This month we will be celebrating accomplishments of our past. Please bring up to ten slides to share that show members of NPSO, especially of the Portland Chapter, involved in conservation, lobbying, plant identification, sightseeing, ect. Anyone knowing of past members that may have historical slides that date back to the chartering of the NPSO please contact Tom Cherick Jr. (284-5156) so that I can show some of these slides also.
- 14 July, Sat. **FIELD TRIP** to Iron Mountain. A joint trip with the High Desert Chapter. One of Oregon's classic wild flower hikes. Portland Chapter leaves at 7am from the Tualatin K-mart off I-5. We will meet the High Desert Chapter at 9:30am at the Santiam Junction (US 20 & 22). Leader: Marge Ettinger (1-382-2255). Portland contact Elizabeth Handler (244-5320).
- 21 July, Sat. **FIELD TRIP** to Sheep's Canyon on the west side of Mount St. Helens. Anticipate high elevation *Colomia*. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot, or Yale Park west of Cougar. Leader: Carroll Dubuar (234-4135).
- 28 July, Sat. **FIELD TRIP** to Roster Rock State Park, south of the freeway. This is an opportunity to observe the destructive effects of cattle grazing or a method of vegetation control by Oregon State Parks. Leave from Lewis & Clark State Park at 9:30am. Leader: Russ Jolley (286-2350).
- 4 Aug., Sat. **FIELD TRIP** to Coffin Mountain. An opportunity to see several native rhododendrons. Other exciting species to enjoy include several spp. of *Penstemon*, *Mimulus* and *Lewisia*. Leave at 7:30am from the Tualatin K-mart off I-5, or from the Maples exit off Hwy 22 at Gates at 9:30am. Leader: Dallas Boge, contact Elizabeth Handler (244-5320).

Siskiyou

- 7 July, Sat. **FIELD TRIP** to Sharon Lake Bog just below the Dead Indian Plateau. John Christy, wetland ecologist for the Oregon Natural Heritage Data Base will lead this hike to see such oddities as mare's eggs, cyanobacteria, freshwater sponge, insectivorous *Utricularia* and *Drosera*, and the moss *Drepanocladus*. Due to the fragile nature of this area, the hike will be limited to the first 12 who call. Dress to get wet: sneakers or hip waders. Difficulty-strenuous. Meet at 8:30am at the Ashland Bi-mart. For info, call Darren Borgias (482-8196).
- 14 July, Sat. **FIELD TRIP** to Mt. Eddy. Dr. Frank Lang, Botany instructor at Southern Oregon State College will lead a trip to Mt. Eddy to see Northern California high elevation flora. High elevation *Darlingtonia* bogs, several endemic species, lakes, and wonderful views of Mt. Shasta. Difficulty-moderate to strenuous. Meet at 7am at the Ashland Bi-Mart and expect to be back late. Info. 482-5235.
- 28 July, Sat. **FIELD TRIP** to the native forest of the Dead Indian Plateau. Richard Brock will lead an easy walk through a remnant of this once great forest of the South Cascades, with a stop at Deadwood Fen. Meet at 8:30am at the Ashland Bi-Mart. Info. 482-4111.

South Coast

For information, contact Jim Curran (396-4939).

Umpqua Valley

Informal FIELD TRIPS every Tues. and Sun. with the Museum herbarium staff. Contact Mildred Thiele (673-5397) for more info.

8 July, Sun. FIELD TRIP to Tipsoo Peak. A moderate 3.5 mile hike through mature mountain hemlock and white bark pine habitat, to see subalpine rock plants in Mt. Mazama pumice ashfall and remnant of a pliocene volcano. Leader: Jack Hausotter (874-2462). Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd., Roseburg for carpooling, or meet at the Diamond Lake Ranger Station at 10am.

19 July, Thurs. MEETING. 7pm at the BLM Office, 777 NW Garden Valley Blvd., Roseburg. Follow Steve Ericson's footsteps through the Umpqua National Forest as he gathers material for a trail guide.

16 Aug., Thurs. MEETING. Get to know your fellow NPSOers at our Potluck Social, 6pm at Hillcrest Vineyard, 240 Vineyard Lane, Roseburg. Bring your favorite main dish and bread, or salad and dessert, and your own table setting. For info., call Donna Carlson (672-4430).

18 Aug., Sat. FIELD TRIP to Old Man Camp to view an alpine bog and pumice meadow. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd. Roseburg for carpooling, or meet at the Diamond Lake Ranger Station at 10am. For info., call Mary Carlson (496-3303).

Willamette Valley

To hear about unscheduled mid-week trips to places near & far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).

7 July, Sat. FIELD TRIP to some little-explored wetlands near I-5 and Hwy 22 near Salem. Easy but wet walking. May include a second site west of Salem. Should be interesting--we have a knowledgeable leader in Dale Groff (223-6808, Portland). In Salem call Barbara Halliday (371-1025). Leave at 8am from South Salem K-Mart.

15 July, Sun. FIELD TRIP to Triangulation Peak. Inspiring views of Mt. Jefferson, and prime time for mid-elevation (5400') wildflowers. Moderate hike, 4 mi. round trip. Leader: Frances Schaeffer (393-7492). Leave at 8:30am from South Salem K-Mart.

21 July, Sat. FIELD TRIP to Three Creeks Lake on the east side of South Sister. Good area for mountain meadow wildflowers. Easy walking. Leader: Clint Urey (581-1805). Leave at 8am from South Salem K-Mart or meet by 10:30am in Sisters at the junction of Hwy. 126 and Three Creeks Lake Rd.

28 July, Sat. FIELD TRIP to the flower-filled alpine meadows near Timberline Lodge on Mt. Hood. Moderate hike, 4 mile round trip. Leader: Jim Versteeg (393-7397). Leave at 8am from North Salem K-Mart or meet at Timberline Lodge at 10:30am.

5 Aug., Sun. FIELD TRIP to Cloud Cap, on north side of Mt. Hood. A moderate, 5-mile round trip. Trail is at 6000' but never level! Leaders: Bill and Lois Egan (393-2131). Leave at 8am from North Salem K-Mart or meet at Cloud Cap Inn parking lot by 10:30am.

12 Aug., Sun. FIELD TRIP to a wetlands area in Rooster Rock St. Park in the Columbia River Gorge to see *Sagittaria latifolia* (Wapato) in bloom. Easy but wet walking. Leader: Dale Groff (Portland 223-6808). Leave at 8am from South Salem K-Mart. Leave at 9am from South Salem K-Mart or meet by 10:30am at the State Park headquarters.

William Cusick

For information, contact Karen Antell (963-0267).

The 3 otherwise unattributed drawings in this issue are by Diane Aho, Portland Chapter, and were made at the recent state meeting.

NPSO POLICY STATEMENT ON REVEGETATION AND RECLAMATION

This statement was adopted by the NPSO board at the June, 1990 meeting.

It is the policy of NPSO to encourage public agencies and private entities to re-establish native vegetation, where appropriate, in disturbed sites. Our reasons for this policy and suggested guidelines are outlined below.

We feel that significant earth-moving activities such as road-building and mining, recontouring of disturbed areas, reclamation of damaged lands, and creation of "mitigation ecosystems" should attempt to recreate the natural plant community as much as possible. Oregon's native plants serve as the base of the pyramid that forms the food chain for the rest of the ecosystem. In order to maintain our state's natural biodiversity it is necessary to maintain our native vegetation in an intact condition. Not only is it important to consider the particular species that comprise a given plant community, it is also essential to consider the relative abundance of those species and their geographical source.

We do not support revegetation with non-native species. Such exotic plants can only upset the balance that nature has achieved through thousands of generations of evolutionary development at a given site. In addition escaped exotics are a major threat to the integrity of many of our native systems. They are causing the extinction of some of our native plants. It is inappropriate and unwise to aggravate this problem. In practically all situations, a native species is available which, over the long run, will serve at least as well as a non-native species.

We caution those using native species for revegetation to be sure that the supplier has propagated the native plant rather than obtained it from its undisturbed natural habitat. Collection of native species for transplantation to other areas has the potential to aggravate the problem. A list of native plant suppliers is available through the NPSO.



*Yellow
Lupine or
Sabine's Lupine*



*Indian
Paint brush
Castilleja hispida
Scrophulariaceae*

NEW OFFICERS FOR UMPQUA VALLEY

The new officers for the NPSO's Umpqua Valley Chapter assumed their duties June 1st. Welcome aboard!

PRESIDENT

Richard Sommer
240 Vinyard Lane
Roseburg, OR 97470
673-3709

VICE-PRESIDENT

Jack Hausotter
P.O. Box 841
Riddle, OR 97469
874-2462

SECRETARY

Patty Turcotte
1573 NE Hollis St.
Roseburg, OR 97470
672-0874

TREASURER

Donna Carlson
175 Whitetail Lane
Roseburg, OR 97470
672-4430

JEAN DAVIS AWARD GIVEN

The annual Jean Davis Scholarship has been awarded to Wendy Boyd of Eugene. She will be a student at the University of Oregon, and is a member of the Emerald chapter of the NPSO. We are happy to make this award and feel confident that Wendy will use this in the spirit it is given, to help in the preservation of the native plants of Oregon.

NEW MAILING COMMITTEE NEEDED FOR NPSO BULLETIN

The NPSO has lost its *Bulletin* Mailing Committee. Sara Barnum, longtime former Mailing Committee head, has generously offered to temporarily keep the *Bulletin* rolling out, but cannot do so for long. A new Committee needs to be found soon. One person willing to assist the operation but not direct it may be available. Two experienced mailers are willing to help train a new Committee Chair and assist at first.

This is a job for one or two people once a month. It entails picking up the newsletters at the printer in SE Portland, taping the edges, placing computer-sorted labels on them, and taking them to the Postoffice. This takes about six hours for the 850 or so mailed each month, plus the pickup and delivery.

Interested? Contact Sara Barnum at 639-3353.



Cypripedium montanum

Drawing by Herm Fitz

Originally published in

The NPSO Bulletin, April 1980

A NEW FORM OF MOUNTAIN LADY'S-SLIPPER IN OREGON

Chuck Sheviak has just described a new orchid from British Columbia, *Cypripedium montanum* Dougl. ex Lindl. forma *praetertinctum* Sheviak. Besides the type locality in Canada, the only other record for this color form is from Lane County, Oregon, where it was discovered in 1932 along the McKenzie Highway. Only two individuals of this new taxon were ever found. Both were collected. Details can be found in the journal of the New England Botanical Club (Sheviak 1990).

Literature Cited

Sheviak, C. J., 1990. A New Form of *Cypripedium montanum* Dougl. ex Lindl. *Rhodora* 92: 47-49.

---Peter F. Zika, Emerald Chapter



Old Man's
W. Haskins

Geum triflorum
Rosaceae

CATTLE GRAZING IN ROOSTER ROCK STATE PARK: A TREASURE ABUSED

A large part of Rooster Rock State Park lies south of Interstate 84. This is Columbia River bottomland, mostly wetlands stretching for about two miles east from Crown Point and averaging a quarter-mile between the freeway and the Union Pacific Railroad (see accompanying map below).

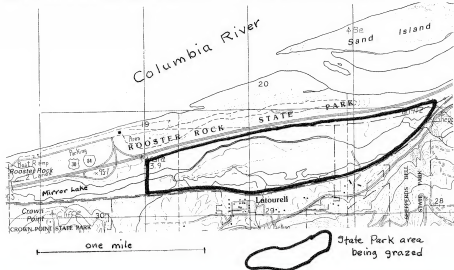
Two beautiful streams, Young and Latourell Creeks, flow westward through this area, separated by a low sand ridge forested with cottonwood, ash, and Douglas-fir. Of the dozens of native flowers found in this area, some are especially characteristic of bottomlands, including *Lysimachia ciliata* (Fringed Loosestripe), *Physostegia parviflora* (Dragonhead), *Lycopus uniflorus* (Bugleweed), *Polygonum hydropiperoides* (Water Pepper), and *Sagittaria latifolia* (Wapato). It is important to note that the *Sagittaria* marsh association is considered endangered in Oregon.

Amazingly, although I-84 is only a few hundred feet away, much of the area along Young Creek seems rather quiet and remote, and Latourell Creek even more so. The bottomlands are home to a variety of wildlife, including very active beavers, deer, ducks, and blue herons. On occasion bald eagles can be seen on snags near the creeks.

Unfortunately, there is a problem in this idyllic picture, namely COWS! In 1977, State Parks decided to make some money by leasing most of the park south of I-84 to the adjacent landowner for cattle grazing. The result was a disaster for the area, all thoroughly documented with photographs. The beautiful riparian areas along both streams were converted to muddy bogs and the streams ran muddy all the time. The extensive wapato patches were eaten up, as were most of the other plants. The few unpalatable species, such as water pepper, were merely trampled. Cowpies were evident in every direction. The whole area looked and smelled like a barnyard.

After complaints by grazing experts, the Lewis & Clark Trail Committee, and the NPSO, State Parks tacitly acknowledged the documented damage to the wapato. In 1978, most of the wapato areas along Young Creek were fenced to exclude cattle. However, nothing was done to protect the balance of the wetlands, including Latourell Creek and unfenced parts of Young Creek.

Even though this is state park land within twenty-five miles of the center of Portland, it has been given over to the cattle, and the public is not wel-





come. The uninformed might well suppose that this area of fences, cows, and cowpies is private land instead of public park---and, in effect, it is. The public has'nt been invited, by signs or otherwise, to enjoy this piece of public land. Even the stiles supposed to let people through the fence have mean strings of barbed wire across them. Longtime proposals to build an interpretive trail through the bottomland have been turned aside.

In a 1989 report to the Columbia River Gorge Commission, The Nature Conservancy found that "grazing should be discontinued on all lands at the site". The further recommendation was the the entire portion of Rooster Rock State Park south of I-84 be designated a natural area as one of the two most important wetland complexes in the western Gorge. State Parks has declined to discontinue the grazing, pleading with excuses such as "keeping the grassy areas open", or "keeping the blackberries down".

As part of the Columbia River Gorge National Scenic Area, Rooster Rock State Park bottomlands were recently given a preliminary designation as "Open Space", i.e., protection, but State Parks officials have so far ignored this designation. In fact, even the supposedly protected enclosure along Young Creek has been routinely grazed. The fence intended to protect some of

the Wapato patches has been neglected ever since it was built. Over the years, NPSO members have urged State Parks to repair the enclosure fence and have offered volunteer help to get the job done. But, in spite of repeated verbal and written assurances by State Parks officials, literally nothing was done. As of May 29th, cattle were still grazing inside the enclosure. All in all, it is a sad history of negligence, unkept promises, and insensitivity to natural values.

The final outrage, difficult as it may be to believe, is that the permittee, who is running 156 head of cattle on state park land during 1990, will be paying literally NOTHING, not one red cent, for the privilege of desecrating our beautiful wetlands. How's that for scandal?

LETTERS NEEDED!

If you feel that cattle grazing is inappropriate in Rooster Rock State Park, let the State Parks director know how you feel. Write:

Dave Talbot
Oregon State Parks
525 Trade St., SE
Salem OR 97310

Note: A Portland Chapter field trip to the Rooster Rock State Park wetlands is planned for Sat., July 28 (see Chapter News). The State Parks regional supervisor has been invited along.

JUST WHAT IS A KALMIOPSIS?

I was asked an interesting question after dinner at our recent wonderful Annual Meeting at the Bar M Ranch near Pendleton. The asker, who didn't mention his name, wondered just what the meaning of the word "Kalmiopsis" was. He asked if it might be an Indian word and said he was sure that many NPSO members would be interested in the origin of the name. Since Kalmiopsis is to be the name of NPSO's new, premier botanical journal, I thought it would be reasonable for me to offer a brief explanation of the name here. I don't think this little article will, in any way, spoil your enjoyment of the full, exciting story of the discovery and naming of this unique Oregon plant. This information, which I am now beginning to research, will appear in the first issue of Kalmiopsis, the Journal, due to appear early in 1991.

During the years 1747-1749, Peter (Pehr) Kalm, a young (32-year-old) Swedish botanist and friend and student of Linnaeus, traveled in eastern North America looking for new plants to send back to his teacher for naming. Coming across two species of beautiful pink to rose or white flowering shrubs in the family Ericaceae, Peter Kalm sent them home to his master. The plants were unique in that inside each blossom, ten little pouches held the anthers. When the flower was touched, the stamens sprang up suddenly to release the pollen. Linnaeus was no doubt charmed by this unique plant, and named it *Kalmia*, for his student, its discoverer. *Kalmia* goes by the common names laurel or mountain laurel. The genus has about six species in America. Hitchcock recognizes two species in our area which grow in bogs or mountain meadows and are called alpine laurel, swamp laurel or *kalmia*.

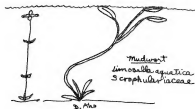
Lilla and John Leach of Portland discovered the plant which came to be called Kalmiopsis in Curry County at Gold Basin on June 14, 1930. Lilla was greatly excited because she knew at once that she had found a plant new to science. She sent specimens to Louis F. Henderson at the University of Oregon Herbarium in Eugene. Henderson at first believed the plant belonged in the genus *Rhododendron* and gave it the name *R. leachianum* to honor its discoverer. However, specimens of the new plant were also sent to Alfred Rehder, curator of the Herbarium at the Arnold Arboretum outside Boston, who correctly

determined that the plant belonged to a genus completely new to science. He gave this new genus the name Kalmiopsis. (The Greek suffix "opsis" means "with the appearance of.") So the name Kalmiopsis, as used by Rehder, indicates that the plants were similar in form to members of Linnaeus' genus *Kalmia*. Rehder published the name *Kalmiopsis leachiana* (Hend.) Rehder for the new plant in the Journal of the Arnold Arboretum in 1932 and it bears this name today.

Long-time readers of the NPSO Bulletin may remember earlier articles about the discovery and naming of Kalmiopsis leachiana. I refer you to our September and October, 1982 issues where then-editor Linda Vorobik published excerpts from Lilla Leach's "Botanizing in Oregon's Hinterland," which subsequently appeared in Mazama in December, 1983. I also refer you to Ed Thatcher's article in the NPSO Bulletin for August, 1984 entitled "Discovery and Naming of the Oregon Endemic Genus Kalmiopsis."

It will be my pleasure and honor to write an illustrated article on this subject for the first issue of NPSO's new journal, Kalmiopsis. Fortunately for me, Ed Thatcher has already covered some of this ground and I plan to lean heavily on his knowledge and some of what he has already compiled. My article will be in 3 parts: the discovery of the plant, the naming of the species, and the establishment of the Kalmiopsis Wilderness. I hope to be finished with my research by this September. If Bulletin readers have or know of any information or pictures that might be useful to me, I would very much appreciate hearing from you.

Rhoda Love, Associate Editor,
Kalmiopsis, the Journal





NATURAL SCIENCE ILLUSTRATION

Instructor: Linda Ann Vorobik

August 12 - 22, 1990

2 semester credits; 3 quarter credits

\$440 without credit, \$490 with credit

(price includes room and board)

COURSE CONTENT

Natural Science Illustration at Malheur Field Station will be a marathon of artwork in the beautiful high desert of eastern Oregon. It is designed to accommodate the needs of the beginning illustrator as well as to teach new methods to the more seasoned artist. In the field, learn basic drawing skills and how to render organisms with both aesthetics and accuracy in mind. We will work with both living and preserved specimens, and will discover how to best interpret and portray different kinds of plants and animals. Media used will include graphite, pen and ink, scratchboard, color pencils, and watercolor. Illustration topics will range from basic drawing skills to publication techniques, creating the illustration resume and portfolio, and making a business of biological illustration.

THE INSTRUCTOR

Linda Ann Vorobik holds a B.A. and a Ph.D. in Biology and has instructed numerous college level courses in Biology. She has been illustrating for over 12 years and her work appears in numerous scientific books and journals. Currently she works as a freelance artist and is also one of two illustrators for the new *Jepson Manual of Vascular Plants of California*, U.C. Berkeley.

FOR MORE INFORMATION

Write to Dr. Vorobik at Jepson Herbarium, University of California, Berkeley, CA 94720, or call (415)643-7008 (days) or (415) 527-3023 (messages).

MALHEUR FIELD STATION REGISTRATION FORM

DATE _____

Please Print or Type

NAME _____

SOCIAL SECURITY # _____

ADDRESS _____

CITY _____ STATE _____ ZIP _____ PHONE _____

WHERE CAN YOU BE REACHED TWO WEEKS PRIOR TO COURSE? _____

ADDRESS _____ PHONE _____

HOW DID YOU FIND OUT ABOUT MFS? _____

SCHOOL ENROLLED IN AT PRESENT _____

PLEASE ENROLL ME IN THE FOLLOWING COURSE(S): _____

DATES _____ COURSE NAME (In Order of Preference) _____ CREDIT / NON-CREDIT _____

ENCLOSE AND DEPOSIT \$10 FOR EACH CLASS IN ORDER TO RESERVE YOUR SPACE. EVEN IF YOUR FEES WILL BE PAID BY FEDERAL AGENCY OR WORK/STUDY AIDS, THE DEPOSIT APPLIES TOWARD THE PRICE OF THE COURSE. MAKE CHECKS PAYABLE TO MALHEUR FIELD STATION.

PLEASE SEND ME MORE INFORMATION ABOUT:

- ☐ WORK/STUDY/VOLUNTEERING
- ☐ VOLUNTEER WORK WEEK
- ☐ NON-CREDIT LECTURES & WORKSHOPS
- ☐ FAMILY WORKSHOP

I WOULD LIKE TO BECOME A MEMBER OF MFS (CIRCLE ONE):

STUDENT \$10 INDIVIDUAL \$25 FAMILY \$25 OTHER _____

\$100 OR REGISTRATION DEPOSIT

\$15 OR REFUNDABLE CLEANING DEPOSIT

\$ _____ AMOUNT INCLUDED

☐ CHARGE TO VISA or MASTERCARD

NUMBER _____

EXP. DATE _____

SIGNATURE OF CARDHOLDER _____

DETACH & MAIL TO:
Malheur Field Station, HC 72 Box 260, Prineville, OR 97721

RELEASE AND ASSUMPTION OF RISK

I am aware that during the courses that I am participating in under the auspices of the Malheur Field Station, certain dangers may exist, including but not limited to the hazards of travelling in desert or mountainous terrain, accidents as often in remote places without medical facilities, the effects of nature, and severe fire, heat or other conditions. In consideration of all, and as part payment for the right to participate in such course or other activity, I have and hereby assume the risks and all legal responsibility for injury or death or loss of any property resulting from participation in these courses or other activities, and do hereby hold Malheur Field Station harmless from any and all liabilities, actions, causes of action, demands and demands which I now have or which may arise in connection with my participation in these courses or other activities. These terms shall survive any release and assumption of risk for any facts, accidents, admissions, and for all members of my family. I affirm that my general health is good and that I am not under a doctor's care for any condition which will endanger my health or the health of other participants. In case of injury and/or illness, I will bear the cost of any medical procedures such as ambulance, helicopter, medical care and professional medical care. I have read registration form, catalog and MFS policies and am aware of governing principles of the Great Basin Society, Inc., Malheur Field Station.

DATE _____ SIGNATURE _____

BY SIGNING, AS PART OF THE DEPOSIT OF REGISTRATION FEE, I AGREE

BITS AND PIECES

—News and Information From All Over

NATURAL AREAS AND YOSEMITE: PROSPECTS FOR THE FUTURE

This is billed as "A Global Issues Symposium Joining the 17th Annual Natural Areas Conference with the Yosemite Centennial Celebration". The symposium will begin with a weekend in Yosemite National Park followed by five days of talks, displays, and field trips to San Francisco Bay region natural areas. The sessions will concentrate on the many issues surrounding natural area protection, management, research, interpretive education, and related art and literature. Dates will be October 13th thru 19th, 1990. More information is available from:

Coordinator
NA/Yosemite Centennial Symposium,
GGNRA, Fort Mason Bldg. 201,
San Francisco, CA 94123.

THREE SISTERS WILDERNESS PROGRAM

Kids and adults restoring an overused wilderness site. Teamwork, creativity and accomplishment. Sound interesting? That's what will be happening this summer in the Three Sisters Wilderness Area as the Bend Ranger District launches its new program to involve the community in wilderness.

Last year while repairing a vandalized restored wilderness site, Wilderness Ranger Michelle Kaptur decided that the public needed to get involved in wilderness restoration. "If people knew why a spot needs restoration, got involved in the process and felt some ownership in wilderness, maybe the vandalism would taper off", said Kaptur. She also hopes to further the No Trace education program that she started last year.

If you are involved with an adult or youth group or have children and would like to find out more about this program contact Deb Aiken, Bend Ranger District, at 388-5664.

BLM VOLUNTEER OPPORTUNITIES IN OREGON AND WASHINGTON

The BLM Oregon State Office has issued a call for volunteers to help carry out a wide variety of jobs on BLM land in Oregon and Washington. Pointing out that their budget does not cover sufficient manpower to carry out all their mandated tasks, and that they manage nearly a quarter of the state of Oregon, they state that volunteers have been doing "work that would otherwise go undone". Volunteers last year contributed about 1.3 million worth of time in the two states. Evidently thousands donate time to the BLM each year nationwide.

Their list of possibilities is quite diverse and include several projects of benefit to native plants. In the Burns District they wish 1-3 people to establish photo plots in fragile and/or overused Wilderness Study Areas to gain data for management, and 1-3 people to conduct surveys of WSA users. A group of 10-50 could take on "old dump cleanup, removal of fallen down unused fence, and other attempts to erase human imprint" in WSA's, or individuals with a Macintosh computer can work on WSA-related Pagemaker documents. The Salem District is looking for trail, bench and bridge builders, wildlife counters, and tree planters. The Eugene District wants someone to help call and count spotted owls. Lakeview District wishes help fencing aspen stands and riparian areas to keep the cattle from grazing there. Several districts want people interested in working directly with the public in areas ranging from developed campgrounds to wilderness areas. People with general construction or trail-building interests are also desired.

Many other possibilities are listed in their magazine-size handout. Those wishing to have more information from the BLM should contact the State Volunteer Program Coordinator at 503-231-6271.

STATE OFFICERS

DIRECTORS.....	Paula Brooks, John Christie, Tom Kaye, Barbara Mumblo, Kathy Schutt, Marjorie Willis
PRESIDENT.....	Stephanie Schulz..... 652 W. 10th St. #1, Eugene 97402-485-1868
IMMEDIATE PAST PRESIDENT.....	Sue Garrett..... 21663 Paloma Drive, Bend 97701; 389-6981
VICE PRESIDENT.....	Dan Luoma..... 2912 NW Arthur Ave., Corvallis 97330; 758-8063
SECRETARY.....	Sue Villalaz..... 1120 NE 162nd, Portland 97230; 253-7080
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BULLETIN

GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome. **Deadline:** Copy is due with the editor by the 10th of the month. **Text Format:** Submission is to be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in long, with spacing between columns .22 in. The *Bulletin* uses 10 point "Geneva" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article posted inside their favorite field guide. **Computer Disks:** The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details. **Illustrations:** Line drawings are preferred to pictures requiring half-tone reproduction. Contact the editor about our current needs. **Credits:** If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., when appropriate. Use of both scientific and common names is encouraged. **Italicize genus and species (underlining if italic is not available).** **Return of Originals:** Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all. Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

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 Address _____ Is this a change of address?
 If so, please write your Old Address here: _____
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* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

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Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Dedicated to the enjoyment, conservation, and study of
Oregon's native vegetation

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

For information, call Bruce Barnes (276-5547).

Corvallis

For information, call Wes Messenger (929-4002).

Emerald

14-19 Aug.

For information, call Diane English (484-9287).

LANE COUNTY FAIR. Emerald Chapter will be having a booth promoting NPSO interests. If you can assist with this call Diane English (484-9287).

High Desert

11 Aug., Sat.

FIELD TRIP to Broken Top Volcano. Our annual hike to view the spectacular display of alpine wild flowers and glacial and volcanic geology on Broken Top Volcano. A 5 mile round trip moderate to strenuous hike with a 1500' elevation gain, mostly in the Three Sisters Wilderness. Number of hikers limited due to wilderness regulations. Call trip leader to register. Geologist Bruce Nolf accompanies trip leader Stu Garrett (389-6981 eves or 382-2811 days).

Mid-Columbia

1 Aug., Wed.

MEETING. 7:30pm at the Mosier School will be a very special guest: Dr. Robert Pyle, leading authority on butterflies of the Pacific Northwest, speaking about "Butterflies: Flying Flowers". This is one program you won't want to miss! See accompanying article.

5 Sept., Wed.

MEETING. 7:30pm at the Mosier School. Ron Halvorsen will present an overview of selected botanical activities on the Prineville BLM district. Opportunities for chapter involvement will be discussed and plans made. The White River south of Tygh Valley will be one highlight.

North Coast

9 Aug., Thurs.

MEETING. Potluck Picnic at Cape Lookout State Park, in the day picnic area, starting at 5:30 or 6pm. Bring your own plate, silverware, and cup. Call Jean Gilbert (842-4801) for more information.

25 Aug., Sat.

FIELD TRIP. Linda Steiner leads us into the watershed behind Tierra del Mar. Leave at 9am from the PUD lot in Tillamook or 10am at the gate off the road near Tierra del Mar. For information call Al Krampert (842-2308).

Portland

4 Aug., Sat.

FIELD TRIP to Coffin Mountain. An opportunity to see several native rhododendrons. Other exciting species to enjoy include several spp. of *Penstemon*, *Mimulus* and *Lewisia*. Leave at 7:30am from the Tualatin K-mart off I-5, or from the Maples exit off Hwy 22 at Gates at 9:30am. Leader: Dallas Boge, contact Elizabeth Handler (244-5320).

11 Aug., Sat.

FIELD TRIP to Multnomah Bog. This is an easy trip, but dress to get wet and bring bug repellent. Leader: Lois Kemp (760-4998). Leave at 8am from the west end of the Gresham Fred Meyer parking lot.

25 Aug., Sat.

FIELD TRIP from Cloud Cap on the north side of Mt. Hood, towards Elk Cove. Leader: Doris Ashley (635-3911). Leave at 7:30am from the NE 122nd and Sandy K-Mart parking lot.

8 Sept., Sat.

FIELD TRIP to the Indian Heaven Huckleberry fields. Leader: Elizabeth Handler (244-5320). Wilderness regulations require no more than 12 persons in the group. Please call for advance registration. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot.

Siskiyou

For information, call Richard Brock (482-4111).

South Coast

For information on formation of this pending chapter, contact Jim Curran (396-4939).

Umpqua Valley

Informal **FIELD TRIPS** every Tues. and Sun. with the Museum herbarium staff. Contact Mildred Thiele (673-5397) for more info.

16 Aug., Thurs.

MEETING. Get to know your fellow NPSOers at our Potluck Social, 6pm at Hillcrest Vineyard, 240 Vineyard Lane, Roseburg. Bring your favorite main dish and bread, or salad and dessert, and your own table setting. For info., call Donna Carlson (672-4430).

18 Aug., Sat.

FIELD TRIP to Old Man Camp to view an alpine bog and pumice meadow. Leave at 8am from the BLM parking lot, 777 Garden Valley Blvd. Roseburg for carpooling, or meet at Whitehorse Fall CG sign at 9:30am (66 miles east of Roseburg on Hwy 138), and then proceed up Rd. 4785 (just east of the CG) to Old Man Camp. For info., call Mary Carlson (496-3303).

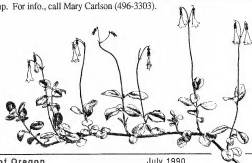
Linnaea borealis

Twinflower

Drawing by Ramona Hammerly

from *Northwest Trees*

Used by permission.



Willamette Valley

- To hear about unscheduled mid-week trips to places near & far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).
- 5 Aug., Sun. FIELD TRIP to Cloud Cap, on north side of Mt. Hood. A moderate, 5-mile round trip. Trail is at 6000' but never level! Leaders: Bill and Lois Egan (393-2131). Leave at 8am from North Salem K-mart or meet at Cloud Cap Inn parking lot by 10:30am.
- 12 Aug., Sun. FIELD TRIP to a wetlands area in Rooster Rock St. Park in the Columbia River Gorge to see *Sagittaria latifolia* (Wapato) in bloom. Easy but wet walking. Leader: Dale Groff (Portland 223-6808). Leave at 9am from South Salem K-Mart or meet by 10:30am at the State Park headquarters.
- 18 Aug., Sat. FIELD TRIP to Breitenbush Meadows, near Breitenbush Lake in the Cascades. Easy hike---we'll be looking for gentians and other late-summer flowers. Leave at 7:30am from South Salem K-Mart. A 2.5 hour drive from Salem--with the last few miles over fairly rough road. Leader: Wilbur Bluhm (393-2934).

William Cusick

For information, contact Karen Antell (963-0267).

RARE AND ENDANGERED PLANTS OF OREGON

By DONALD C. EASTMAN
Forward by JEAN L. SIDBALL
BEAUTIFUL AMERICA PUBLISHING CO.
WILSONVILLE, ORE. 1990

This long-awaited book is destined to be known for its *sumptuous* photography. Other books may have photos as striking, but none have ones as informative. The photos are not only clear and attractive, but also they were selected to include sufficient detail to make identification of plants in the field a snap. The user can often identify species on the basis of the photos alone. A brief, non-technical written description assists identification. Also included in the two paragraphs that accompany each plant is information on rarity, habitat, range, time of bloom, and population trends. Small maps also help delineate the areas in which each plant grows.

This book should easily spur renewed interest in our rarest native plants. No photographic book before has concentrated on increasing our awareness of the rare and endangered plants around us; no book has made identification of these plants possible by the average amateur. Don Eastman has certainly filled a void in the literature. And this book will allow many of us to cross the bridge from curiosity about the often unknown rarities around us to real awareness and knowledge. At the very least this book will expose the reader to the diversity and beauty of our rare native flora.

This book is attractively designed and will serve anyone well as a coffee-table book. The main text is the plant photos and accompanying information, which account for more than 80% of the page count; the forward, introduction, appendices, bibliography, and index take up the remainder. The introduction has a commentary on conservation of rare plants, an article on their distribution in Oregon, and a discussion of the book's purpose and the selection process for choosing which plants were included. It also has a general map of vegetation types, brief articles on plant names and on his criteria in setting up his plant descriptions, and a longer article on plant photography. The appendices include a Glossary, Bibliography, and a listing of the botanical family classification of each species in the book. The index covers both common and botanical names, but no general index is included.

If I were to criticize this book, it would be for not including even more information, but this would perhaps be asking for it to go beyond its stated aim of promoting awareness of our rare and endangered plants. We still need our Hitchcock; this is not a definitive botanical treatise. It is a book best seen as a popularizer of subjects little known because of their scarcity. That it goes beyond this is a tribute to the dedication, expertise and enthusiasm of the author for our native flora.

---Bryan Boyce

"Flying Flowers Coming to Mosier!"

What? What are flying flowers you say? Well you won't want to miss this exciting program to be presented at the August 1st meeting of the Mid-Columbia Chapter of NPSO. The Pacific Northwest's leading lepidopterist, Dr. Robert Michael Pyle, will bring this colorful show: BUTTERFLIES: FLYING FLOWERS to the Mosier School 7:30 P.M. that Wednesday evening. Although we may all be aware of the vital relationship which exists between flowers and butterflies, here's our inspiration to begin a more in depth study. Dr. Pyle is the author of the "Audubon Society's Field Guide to North American Butterflies". Currently a writer and consultant in biological conservation, his work has taken him as far as Papua New Guinea. There he worked on a government grant for birdwing butterfly conservation. He has a PhD in insect ecology from Yale University and founded the Xerces Society, an international organization for beneficial and rare insect habitat protection. He has also served as the Northwest Land Steward for the Nature Conservancy. Other books he has written include - "Watching Washington Butterflies" and the "Audubon Society's Handbook for Butterfly Watchers". The latter includes two chapters of particular interest to NPSO members: Butterfly Gardening and Butterfly Conservation. His latest book, "Wintergreen - Listening to the Land's Heart", describes his naturalist's experiences and observations in the Willapa Hills of Southwestern Washington. There are many references to flora and here is just a sampling:

"The *Clodius parnassian* and its host", (*Dicentra formosa*), "make one of the great aesthetic partnerships of the Northwest woods: the elegant green stands of lacy bleedingheart, flecked with aromatic pink flowers, frequented by the great floppy white butterflies, speckled with scarlet and jet."

"When I wonder at plant power, I think of marah. Also known as wild cucumber or manroot, this native cucurbit climbs high into the forests from its

base beginning underneath. Marah, honey-suckle, and wild clematis, or old man's beard, make our only true lianas - ground rooted aerial plants with high climbing vines. Marah dies back each year, then, beginning anew at ground level, clambers and twines fifty or seventy five feet into the air each summer, bedecking hamlock, cherry, and bare slope alike with its grapelike leaves, watch-spring tendrils, and fruits like little green hedge hogs. The name manroot grows out of its enormous tuber. A new path down to the beach at Oregon's Ecola State Park recently revealed such a root in the trail-cut. When we show it off, onlookers insist it must be some great stone imbedded in the soil. There lies the root of true growth."

Included in this 300+ page book are ten pages devoted to highlighting particular species and butterfly relationships of the more than 80 plant families found in the Willapa Hills. For example he says:

"Cruciferae: Yellow stone crops clinging to the basalt bluffs, furnishing forage for the compact larvae of the early elfin butterfly."

"Cruciferae: The mighty mustards, including an arrangement of cresses besides the delicate pink *Cardamine pulcherrima* that nectars and forages the veined whites as the woodland begins to leaf out in Spring."

"Violaceae: Our violets are chiefly yellow (pioneer and evergreen) though the marsh violet is a clear violet blue. Spring azures nectar on the lemony flowers of *Viola sempervirens*, and *hydaspe fritillaries* lay their eggs on *Viola glabella's* leaves."

Such wonderful information as this you'll find in Dr. Pyle's butterfly books.

It is indeed a rare and unusual appearance Dr. Robert Michael Pyle is making at our Mid-Columbia Chapter meeting. We extend this special invitation to other chapters' members and friends to attend and share in our good fortune!

PRESIDENT'S MESSAGE

Hello NPSO members! I'm looking forward to representing the society in the coming year. I'd like to introduce myself, write briefly about the annual meeting, and give everyone an idea of what I see as goals for NPSO in the coming year.

I have lived in Oregon my whole life except for one winter in Hawaii. As a child in the Rogue Valley I remember the Agate Desert with its vernal pools, Climbing Table Rock, and flowers in the spring. Now I live in Eugene, and work for the US Forest Service as a landscape architect, camping and hiking in the forest, botanizing vernal pools in the Willamette Valley, and incorporating native plants in landscape designs whenever possible. I have been an NPSO member for 7 years, and have been an active chapter participant for 2 years, serving as vice-president and rare and endangered chairperson for the Emerald Chapter.

I would like to extend a warm "Thank You" and "Well Done" to the Blue Mountain Chapter for hosting an exceptional annual meeting at the Bar-M Ranch, a place that will live forever in the minds of all who were there. The lodge was a perfect base from which to explore the Blue Mountain flora. Thanks also to Jerry Fränklin, guest speaker at the banquet, for the futuristic view of "New Forestry", and the concept of large conifers as giant sky combs---Great!

The board meeting Sunday was a productive one. We had another distinguished guest, Bob Parenti from the US Fish and Wildlife Service in Boise. He spent a good portion of the morning explaining the listing process of Threatened and Endangered (T&E) plants. The USFWS depends on the Heritage Program and the Oregon Department of Agriculture for information and listing recommendations. Many of the rare plant sites in Oregon are managed by public agencies such as the BLM and the USFS. Conservation agreements between the USFWS and the managing agency have proved successful interim management methods for rare plants before an actual species listing. Sensitive species that grow in specific habitats can be lumped together which makes for a stringer listing package. Think of an ecosystem approach when managing for rare species. When we have questions as to why it is taking so long to complete the listing process, letters should be written to the regional director of the US Fish and Wildlife Service asking for clarification on where in the process the listing package is. Other peo-

ple people that need to be reminded of the importance of native plant protection are the directors of the BLM and USFS and our congressmen.

Along the lines of rare plant protection, we have undergone some changes in our rare and endangered (R&E) board. Ed Alvorson and Jean Siddal have both stepped down from their posts, and possible re-organization of NPSO involvement in R&E issues is upon us. A committee of representatives from each chapter, along with Ed and Jean, met on the 20th of July to discuss the future of the conservation committee, the possibility of having a co-chair, one person from the eastside and one person from the westside sharing the duties at the state level, and chapters continuing to do local searches and monitoring.

There was other business discussed at the board meeting. Those topics can be found in the minutes. Now I would like to present what I see as the goals of the NPSO for the coming year.

- * Education, Education, Education! Continue to develop slide shows on common Oregon native plants to educate school children about biodiversity, ecology and related subjects. Have educational booths at all events around the state---fairs, flower shows, town festivals, ect.
- * Have some fantastic field trips!
- * Expand the number of state board meetings from 3 to 4. (The next one will be held in Ashland on Sept. 29th, 1990.)
- * Improve our R&E 'paper trail', or "the records". A lack of complete information hinders proper species management.
- * Have a successful annual meeting.
- * Improve our communications with federal agencies, aiming for more visibility and increased funding of rare plant programs, thereby increasing their protection and reducing damage to native plant habitats.
- * Provide the necessary 100 hours of volunteer time to the Environmental Federation of Oregon (EFO).
- * Add to our understanding of proper propagation techniques for native plants in landscaping, as well as their siting and use.

Finally, a personal presidential goal---to visit each chapter this year, for a field trip or a meeting. I am looking forward to meeting as many members as possible, so enjoy the summer botanizing, and be sure to get a look at Don Eastman's book, *Rare and Endangered Plants of Oregon*, it is beautiful!

---Stephanie Schulz, NPSO President

FIELD SURVEY FOR THE TYGH VALLEY MILKVETCH IN WASCO COUNTY

Being a student in the field of art with a keen interest in botany, doing field work with the Oregon Department of Agriculture (on a joint ODA-BLM funded project) seemed ideal to combine the two interests. With gratitude I qualified for a NPSO Rare and Endangered Plant Fund research grant. This dream became a reality for me.

I was curious and excited about the completely different plant community, so different from that of the Willamette Valley. I was already acquainted with the wildlife of the High Desert of Eastern Oregon, but not with the flora. I'm amazed at how rich the dry side of Oregon is. The White River Canyon has a very unique combination of plants. The sight of *Juniperus occidentalis* (Pacific Juniper), *Pseudotsuga menziesii* (Douglas fir), *Quercus garryana* (Oregon White Oak), *Pinus ponderosa* (Ponderosa pine), *Calocedrus decurrens* (Incense cedar), and many shrub and herbaceous species was enough to excite the botanist of the survey crew, Tom Kaye.

Our first contact with *Astragalus tyghensis* (Tygh Valley Milk Vetch) was along the White River Road. The plant looks like many of the native plants of Central Oregon, with pale green foliage and yellow-green inflorescences. Up close the plant is covered with a fine coat of hair.

The first couple of days were spent surveying along the roadsides near the White River where populations of *A. tyghensis* had been reported by the BLM. A couple of these sites were found by Morton Peck back in 1950. However, we found no plants where Peck made his collections. I quickly learned about the attitude local ranchers have towards the wild plants in their area. Two ranchers in a beat up truck stopped on the road where we were taking a count of plants. They asked me if I had lost something. I told them I was working for the Department of Agriculture doing a rare plant survey. I began to tell them the name of the plant when I noticed that they had stopped listening to me and were looking at each other. The driver turned to me with a puzzled look and said, "Weeds?" I nodded in agreement and they wished me well.

After three days of surveying, the crew and I got a feel for where *A. tyghensis* likes to grow. It seems to like well-drained soil and open habitats, though we did find some growing under Oak and Juniper. One peculiar landform that *A. tyghensis* preferred is mima mounds or, as the pioneers called them, "Scab and Biscuir". It appears that at one time the entire Juniper Flats area was covered with the odd looking mounds. Many have been plowed over, but more are still intact. It is on these mounds that *A. tyghensis* best thrives. The mima mounds are two to five feet high and they look like piles of soil with bare rocks everywhere between them. We learned that cattle grazing and agriculture have probably reduced the extent of *A. tyghensis* populations.

On the last day of the plant survey I saw what looked like caterpillar frass or bird dung on some of the plants that are growing near the quaint village of Tygh Valley. A close look revealed that it is not caterpillar frass but some type of moth larvae that had built itself a curly shaped house made of sand and plant mulch. We collected some of the larvae to take back to the herbarium.

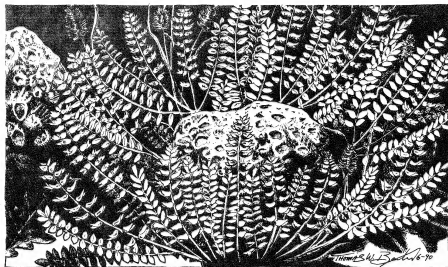
This experience has fueled a fire of deep curiosity for science in me. There was one big distraction for me on this trip; the old homesteads from the pioneers. The whole time I was aching to set up an easel and paint the beautiful weather-worn wood and stone buildings.

---Thomas W. Baxter

BIG BEES AND SMALL FLOWERS

Recently while working near a patch of Indian Pipe (*Monotropa uniflora*) out in my back yard I noted a large bee, probably a carpenter bee, light on the flowers. Wondering how this large bee was going to manage the small flowers I kept an eye on her. Instead of heading for the normal opening she concentrated her attention at the calyx end. Then I observed that there were holes cut into the bases of the flowers through which I assume she might have been obtaining nectar. At any rate, I can't see how she could have been helping out the next generation of Indian Pipes.

---Donald Botteroh, Portland Chapter



Astragalus taylorii

An Alternative to Student Plant Collections

Springtime often finds botany students outdoors collecting plants for their botany course. Up to 100 species are needed to insure a high grade in the course. This requirement is being modified by many instructors due to concern for endangered species and their environments.

Much can be learned from traditional collecting activities, but an alternative method, offered by John E. Silvius in *Environmental Stewardship in Plant Collecting: Niche vs. Notch*, an article in *The American Biology Teacher* 52(2):112-115 (1990), outlines an effective approach to plant collecting which is consistent with NPSO philosophy concerning stewardship of and education about our native flora. Because of the way this approach is designed, the natural emphasis is the study of the species "niche" or ecological role. The article lists clear student and instructor objectives and ways to achieve them. Suggestions

on involving the student in developing the alternative collecting regime is also given. Examples of plant data sheets are provided and suggestions on how this method encourages the students to use herbarium material effectively are made.

Silvius evaluates his approach by comparing the objective of both new and old collecting methods and shows 3 more objectives are met with the alternative approach. He summarizes: "This approach (alternative) permits the accomplishment of all major objectives generally involved in traditional collection. In addition, it emphasizes systematic field observation and data collection, plant population and community relationships, and sensitivity to the issue of plant endangerment and extinction. We believe herein lies collecting in the spirit of stewardship as it should be".

---Gail Baker, Duvall Wa.

EMERALD CHAPTER VISITS PATTERSON MOUNTAIN PRAIRIE

Emerald Chapter members paid a long-anticipated visit to Patterson Mountain Prairie on the Lowell District of the Willamette National Forest, and found the area to be a stunning wildflower paradise.

Our chapter was contacted by the Lowell District late last summer and several of us were taken on a September visit to the meadow (actually one large and several nearby smaller meadows). At that time, we could see that the meadow and surrounding forest had a high diversity of ancient conifers, shrubs, forbs, and non-flowering plants. However, it was too late in the season for a complete survey so we scheduled a trip for July 7 of this year.

Last winter, after the fall visit, Emerald Chapter sent a 4-page letter to the Lowell District urging them to employ a full-time professional botanist, and indicating that we felt that, based on what we had seen, the meadow had significant botanical features. We also made some management suggestions. Principally, we indicated that, in our opinion, the meadow should not be fertilized and seeded with introduced grasses to increase its attractiveness to elk, a plan that the Forest Service was considering.

Approximately 16 people turned out for the field trip Saturday, July 7. Two carloads drove up from Eugene and we were met at the trailhead by several groups from the Willamette National Forest. Our trip leader was Jenny Dimling, Emerald Chapter member and USFS botanist.

An easy hike of about one half mile through magnificent old growth Douglas fir and western hemlock forest, brought us to the meadow, which was ablaze with flowers blooming in the sunshine. I am much indebted to Emerald Chapter member Charlene Simpson, who made notes of the plants seen and provided me with a list the following Monday. The tall flowers of the meadow first caught our eyes: the bright yellows of *Arnica latifolia* and *Senecio triangularis*; the white of *Polygonum bistortoides* and *Valeriana sitchensis*; the bright red of *Castilleja miniata* and the deep, deep blue of great masses of camas. Some of the smaller, low-growing jewels were found as we bent for a closer look. A gorgeous *Sisyrinchium*, tentatively identified as *S. idahoense* was everywhere; it had stunning greyish

foliage. Other smaller gems were: *Vancouveria hexandra*, *Erigeron aliciae*, *Dicentra formosa*, *Hydrophyllum tenuipes*, *Phacelia heterophylla*, *Hypericum anagaloides*, *Prunella vulgaris*, *Smilacina stellata*, *Habenaria dilatata* and *H. saccata*, *Collomia heterophylla*, *Polemonium carneum* and too many others to mention here.

As a hawthorn lover, I was delighted to find the meadow ringed by shrubby *Crataegus douglasii* var. *suksdorfii* in full bloom, attracting its usual host of bee, fly and beetle pollinators. Also, since *Kalmia* has been much on my mind lately (I have been writing an article for NPSO's new journal *Kalmiopsis*), I was thrilled when Emerald Chapter member, Warren Pavlat, found *Kalmia microphylla* in the middle of the meadow.

We were very excited about the *Sisyrinchium* mentioned above, which Jenny Dimling felt was truly different from others she had seen on the Forest. And, in a shady and boggy area at the edge of the meadow, the group was thrilled when Charlene Simpson pointed out *Streptopus roseus*, a rosy-flowered twisted stalk, which many of us had never seen before, growing beside its more common cousin, *S. amplexifolius*. Also, abundant in the woods near the meadow was a healthy growth of *Lycopodium clavatum*. This clubmoss is not an absolute rarity, but is an ancient fernally that botanists enjoy finding, especially when it is as obviously vigorous as this stand was.

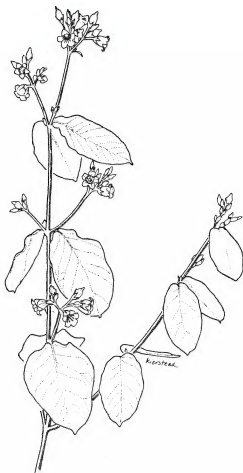
Emerald Chapter is now preparing a letter to the USFS, reiterating our belief that Patterson Mountain Meadow and surrounding old growth forest, should be set aside and managed for their outstanding botanic features. We will include our plant list, prepared by Charlene Simpson and Jenny Dimling, of approximately 90 species seen on this outstanding Native Plant Society of Oregon field trip in the Willamette National Forest.

---Rhoda Love, Emerald Chapter



Polemonium carneum
Great polemonium or
Pink Jacob's-Ladder
Drawing by Herm Flaz

From July 1982 NPSO Bulletin



BITS AND PIECES

—News and Information From All Over

SOCIETY OF AMERICAN FORESTERS HUMAN RESOURCES WORKSHOP

The Oregon and Washington chapters of the SAF are jointly sponsoring a skill-building workshop titled "Alternatives to Conflict in Multi-Resource Forest Management". This workshop is designed for people who want to influence the goals and practices of those who are responsible for multi-resource forest management. It aims at helping participants develop skills for and provide practice in applying strategies to manage potential conflicts.

It will enable people with various interests to talk, share viewpoints and information, and to develop skills useful in preventing or resolving conflicts.

Speakers and facilitators for the two day workshop include individuals from government agencies, colleges, and conservation groups.

The workshop will be on Monday and Tuesday, October 15th & 16th, at The World Forestry Center's Miller Hall in Portland. The \$85 registration fee includes lunch both days. To receive more details and registration information, contact Bob Hosstetter, Society of American Foresters, 4033 SW Canyon Road, Portland, Or 97221 or phone 503-224-8046.

The old-growth forests of the Northwest in their natural state hoard huge amounts of carbon (removed from the carbon dioxide reserves of the atmosphere), stored in roots, boles, snags, duff and soil. Disturbances of the ancient forests (fire, logging) release much of this store back to the atmosphere, where nowadays carbon dioxide is one of the commoner greenhouse-effect gasses thought to cause global warming. In Oregon and Washington about three-quarters of the old growth of 100 years ago have been logged. The release of stored carbon back to the skies from the ancient forests of the two states is estimated to account for about 2 percent of the total man-caused release in the last century. Following logging it takes at least 250 years before the forests can again remove the same amount of carbon dioxide from the air.

BLM MOVES STATE OFFICE

The Oregon State Office of the Bureau of Land Management has moved. Formerly at 825 NE Multnomah St., its new *street* address is 1300 NE 44th, Portland, 97213. Their mailing address remains the same, PO Box 2965, Portland, Or. 97208-2965.

The State Office Botanist, Cheryl McCaffrey, has a new phone—(503) 280-7050.

The Public Room, which holds official public land records and case files of lands and minerals transactions for Oregon and Washington, has the new number of (503) 280-7001.

INDIAN PAINTBRUSH AND PARASITISM

It has long been assumed that the more than 150 species of *Castilleja* or Indian paintbrush are partial parasites. Many horticulturists early on assumed them to be impossible to grow, but reports of flourishing cultivated plants have appeared. Rock gardeners have grown them with daisies native and exotic, and a commercial grower in Colorado has grown them very well in gallon cans with some of their many local native daisies.

The National Wildflower Research Center in Texas has published a report on their research into this matter. Their study required growing three groups each of 100 plants. One group was of *Castilleja indivisa*, another of *Lupinus texensis*, and the third of both planted together. These fast-developing annuals provided quick results, and the test lasted only four months.

The results support the notion that *Castilleja* is indeed a partial (facultative) parasite. Nearly two-thirds of the paintbrush grown with its host had flowered, while none growing alone had (a few were setting flowering stems). Those paintbrushes growing with a host averaged eight times heavier than those growing alone. And it was noted that the host lupines wilted readily while those grown alone did not. In addition, the mortality rate among host lupines was high, and almost none flowered, while about one-third of those grown alone bloomed.

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WM. CUSICK (LaGrande)	Karen Antell..... Biology Dept., EOSC, LaGrande 97850; 963-0267

BULLETIN

EDITOR..... Bryan Boyce... 13285 S. Clackamas River Drive, Oregon City 97045-9411; 655-4457

GUIDELINES FOR CONTRIBUTORS

The NPSO Bulletin is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome. **Deadline:** Copy is due with the editor by the 10th of the month.

Text Format: Submissions can be in any form. Camera-ready copy should be in 3,334 in, wide columns up to 9.3 in long, with spacing between columns .22 in. The Bulletin uses 12 point "Times" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings and high contrast B&W prints are useable. Contact the editor about our current needs, or send along with your article.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Names: Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock, et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available). **Return of Originals:**

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Address _____ Is this a change of address? _____
 If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
 Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO Bulletin. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () Bulletin Subscription only \$12.00
 () Student.....\$ 8.00 () Sustaining.....\$ 30.00
 () Regular.....12.00 () Patron.....100.00
 () Family Membership.....18.00 () Life Member.....500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund..... \$ _____
 Leighton Ho Memorial Award Fund..... \$ _____
 Rare and Endangered Plant Fund..... \$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Send change of address notices to:
Native Plant Society of Oregon
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1920 Engel Court NW,
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Bulletin of the
**NATIVE PLANT SOCIETY
OF OREGON**

Dedicated to the enjoyment, conservation, and study of
Oregon's native vegetation

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

For information, call Bruce Barnes (276-5547).

Corvallis

27 Oct., Sat.

FIELD TRIP for a Cascade Mountains Mushroom Hunt. Leave at 8:30am from the parking lot across from the Monroe St. Beanery. Bring lunch, appropriate clothes, and collecting equipment. Contact Dan Luoma (758-8063) for more information.

Emerald

For information, call Diane English (484-9287).

High Desert

For information, call Bill Hopkins (388-7434).

Mid-Columbia

5 Sept., Wed.

MEETING. 7:30pm at the Mosier School. Ron Halvorson will present an overview of selected botanical activities on the Prineville BLM district. Opportunities for chapter involvement will be discussed and plans made. The White River south of Tygh Valley will be one highlight.

3 Oct., Wed.

MEETING. 7:30pm at the Mosier School. Don Eastman, author of the newly released book, "Rare and Endangered Plants of Oregon" will be our guest speaker. We will see a sampling of his fine photography from his extensive travels and botanical research.

North Coast

6 Sept., Thurs.

MEETING. 7pm at the State Office Bldg., 3600 3rd St., Tillamook. Sallie will discuss dune ecology.

22 Sept., Sat.

FIELD TRIP. A walk on the beach to study beach ecology. Leave 9:30am from the Cornet lot, or meet at Barview State Park at 10am. For information call Al Krampert (842-2308).

Portland

- 1 Sept., Sat. **FIELD TRIP** to the white gentians of Hellroaring Meadows, and other flowers of Mt. Adams. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot. Leader: Bryan Boyce (655-4457).
- 8 Sept., Sat. **FIELD TRIP** to the Indian Heaven Huckleberry fields. Leader: Elizabeth Handler (244-5320). Wilderness regulations require no more than 12 persons in the group. Please call for advance registration. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot.
- 11 Sept., Tue. **MEETING.** 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Invite your friends to an evening with Ed Alverson. Ed will be showing slides of the Bald Hill Park Restoration in Corvallis. Also Tami Katz from the Cascadia Landscape Center will show a few slides on previous Cascadia Conferences.
- 15 Sept., Sat. **FIELD TRIP** to the Deschutes River and Cello area. Leave 8am from the 122nd and Sandy K-Mart parking lot. 2nd meeting at Shilo Inn in The Dalles at 9:30am. Leader is George Lewis (292-0415).
- 22 Sept., Sat. **FIELD TRIP** for a mushroom adventure with Jan Lindgren (1-206-573-6918) Leave 8:30am from the 122nd and Sandy K-Mart parking lot.

Siskiyou

- 13 Sept., Thurs. **MEETING**---Share summer plant hunting adventures at our annual fall Potluck Social, 6pm at Lithia Park. Meet across the creek from the upper duck pond. Bring your favorite main dish, salad or desirable setting and a half dozen slides of your summer adventures. At 7:30pm we will adjourn to the Southern Oregon State College Science Bldg., Rm 171, for a short meeting and the slides.
- sort,

South Coast

For information on formation of this pending chapter, contact Jim Curran (396-4939).

Umpqua Valley

- Informal **FIELD TRIPS** every Tues. and Sun. with the Museum herbarium staff. Contact Mildred Thiele (673-5397) for more info.
- 20 Sept., Thurs. **MEETING.** Gene Hickman, range conservationist of SCS will present plant ecology and soil surveys in SW Oregon--vegetation communities across different soil types. 7pm in the US Forest Service conference room, 2900 Stewart Parkway, Roseburg.
- 22 Sept., Sat. **FIELD TRIP.** Plant ecology and soil surveys in the Cow Creek watershed. 8am BLM parking lot, 777 Garden Valley Rd., Roseburg, for carpooling.

Willamette Valley

- To hear about unscheduled mid-week trips to places near & far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).
- 17 Sept., Mon. **MEETING.** 7pm at Room 225, First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State St). John Christy, botanist for the Nature Conservancy, will speak on "Lake Labish and other Ghost Stories".
- 6 Oct., Sat. **FIELD TRIP** to Jefferson Park for the fall colors in the high country. Approx. 5 miles each way. Number of hikers limited due to wilderness regulations, call trip leaders to register. Leaders: George and Harriet Schoppert (859-2613, Stayton).

William Cusick

For information, contact Karen Antell (963-0267).

NPSO R&E COMMITTEE NEWS

Hi! I have recently volunteered to attempt to replace Jean Siddall as the Native Plant Society of Oregon's R&E Chairperson. While this is going to be a difficult job, with your help we should be able to continue the excellent work that NPSO has been doing in the past.

Since it is the middle of the summer now, I am not going to try to do any organizing of activities for this field season. This fall is the biennial Rare, Threatened and Endangered Plant Conference, which is to be held sometime in the second or third week of November, at the University of Oregon in Eugene. Based on the comments and results of this conference, we plan on republishing the booklet, "Rare, Threatened and Endangered Plants and Animals of Oregon".

This year, we hope to make the conference and publication a cooperative venture between the Natural Heritage Data Base, the Native Plant Society, and the Plant Conservation Biology Program of the Oregon Department of Agriculture; with the Oregon Department of Fish and Wildlife cooperating on the animal portion of the publication.

The conference is our best opportunity to reassess the status of the various plants in Oregon. It also can allow us to come up with ideas as to the best use of the Native Plant Society's energies, ways to work with the many new (and old) Forest Service and BLM botanists, cooperative efforts between the Department of Agriculture's program and NPSO, and the best way to share our expertise and resources. Please plan on being there if you can--and write down any notes about suggested changes to the list (new species to add, significant sightings or species which should be dropped). We will likely have the conference on Thursday-Saturday (if it goes for three days) or Friday-Saturday (if only two days). Agency botanists have requested the weekday dates to be able to attend. We have assumed that most NPSO members would prefer the weekend dates--but we need to hear from you. Can you make it during the week? Would you come only if we hold the conference on the weekend? Drop me a postcard at home (1724 SE 57th Ave., Portland, 97215) or give me a call at work (229-5078) and let me know your preference so we can set a date soon.

If anyone would like to help this summer or fall in the publication of the booklet--we do need help. To have a cooperative project between the different agencies, we will need to change the current format of the booklet--which now emphasizes the Oregon Natural Heritage Program status. We were planning on adopting a format similar to that used in the most recent book done by the California Native Plant Society, and so will have to re-key much of the information. Anybody who lives in the Portland area and has some time and typing skills is welcome to help with this project. Call me or Sue Vrilakas at the Heritage Data Base office (229-5078) if you are interested.

---Jimmy Kagan

STATE BOARD TO MEET SEPTEMBER 29TH

Ever wonder how the Native Plant Society of Oregon manages its diverse statewide activities? Your next chance to see our far-flung State Board organization in action is September 29th. All NPSO Board meetings are open to the public and members are encouraged to attend and participate. The meeting will be at 10am in Science Room 214 at Southern Oregon State College in Ashland.

Please send **AGENDA ITEMS** to President Stephanie Schulz by Sept. 10th.

The voting members of the State Board of the NPSO include State Officers, Chapter Presidents, and the Directors of the organization. The number on the State Board varies but currently is 22. A quorum is needed at each meeting to conduct business. Each Board member has a report to make on the activities they direct or oversee, as do all state committee chairs. In an organization such as ours communications are essential in carrying out our purposes and in reaching our goals. Attendance by all Board members is needed to assure the clearest communications possible within our organization. If Board members or committee chairs cannot attend, they should either send a representative or submit a written report to the secretary before the meeting.

OREGON STATE PARKS RESPONDS TO ROOSTER ROCK GRAZING CONCERNS

The following letter and position paper were sent to those who sent letters or went on the July 28 field trip.

This is in response to your concern on grazing at Rooster Rock State Park.

State Parks concurs on the value of the natural resources located south of the Interstate Highway 84 at Rooster Rock. Large portions of the wetlands and riparian areas there are important vegetation resources. Other areas, such as the eastern 87 acres and certain places dominated by reed canarygrass, are less significant because of severe impacts over the years. The eastern acreage, acquired in 1985, was intensively grazed for decades. However, the grazed areas provide a characteristic pastoral scene which is in keeping with the scenic values of the Columbia Gorge.

Parks is aware of the threats to the significant wetland and riparian areas from grazing intrusion and from invasive weeds and is working towards better protection of these resources. We also recognize the need to control the invasion of brush in the open areas to preserve the visual qualities of the scene as viewed from Crown Point and from the scenic highway.

The Department's short-term goal is to update the vegetation management plan for the area of Rooster Rock State Park located to the south of the Interstate Highway. We will be assembling an advisory group of experts to assist us in this task. We anticipate representation from the Native Plant Society, the Audubon Society, and the Wildlife Federation.

Parks would like to provide better public access to this area of Rooster Rock for interpretation and enjoyment of the open space. The need for improved public access was identified in the 1981 master plan, but it has not received funding, due to lean agency budgets since that time.

Our long term goal is to address the vegetation management issue for all of the state parks in the Columbia Gorge in the course of master planning the entire district. Parks recognizes the Gorge District as having a high priority for the master plan update.

Finally, I would like to address a number of points which have been alluded to in several letters and comments made by the public:

----State Parks initiated grazing at Rooster Rock as a means of vegetation control, not as a source of revenue. The grazing permittee performs various maintenance and repair tasks for the park in return for his grazing right.

----Grazing is a historic use in much of the southern part of Rooster Rock State Park. A photograph of the area, taken before the construction of Bonneville Dam, shows that much of the park's wetlands were intensively used for agricultural lands at that time.

----Restoration of these historically pastoral areas to native wet meadows would be extremely difficult and costly. Letting these pastoral lands return to natural riparian woodland would mean the loss of the characteristic scenery of that area and of the open space potential for recreational use.

State Parks appreciates the comments and concerns which have been voiced about the protection of significant plant communities and scenic open areas at Rooster Rock. Parks shares those concerns and is working towards managing these resources for future public enjoyment and preservation of significant natural values. Attached is a short historical background for your information.

Sincerely,
Larry Jacobsen
Deputy Director

ROOSTER ROCK STATE PARK GRAZING ISSUE

Rooster Rock State Park, in the Columbia River Gorge, encompasses approximately 873 acres. The park is located on both sides of the I-84 freeway with the main day use area located between the Columbia River and the freeway. A portion of the area south of the freeway is under permit with Robert McMillen for grazing.

The grazing issue at Rooster Rock State Park has been controversial since the mid-1970s. At that time, a request was made from an adjoining landowner to lease land for grazing purposes. The concern over grazing had to do with the fact that there were several wetland areas within the land south of the freeway, as well as an area with an uncommon water plant, Wapato. Wapato was once thought to be threatened in Oregon.

At that time, State Parks sought the advice of the Oregon Fish and Wildlife Department and others who indicated that controlled grazing could offer some benefits to wildlife as well as vegetation management as long as the wetland areas and Wapato areas were protected. A task force appointed by Governor Straub to study Columbia Gorge issues also agreed that a controlled grazing program would be a compatible use of the property. As such, Parks issued a grazing permit and the property has been grazed since that time.

In September of 1989, the Parks Master Planning Unit identified significant natural and wetland areas and made recommendations regarding the grazing permit. These recommendations were incorporated into the 1990 permit for grazing use and include the following:

1. Repair of existing fences as well as construction of additional fences to protect wetland and riparian areas.
2. Control of blackberry, ash, thistle and other noxious weeds.
3. Development of a grazing plan in coordination with the Oregon State University Extension Service which will include a schedule for cattle rotation and the number of cow/calf pairs that may be grazed on the property.

The permittee has been very cooperative in accepting the additional conditions that have been placed in the permit. This is evidenced by the fact that he built a fence to totally exclude the cattle from a large area of the pasture after a recent complaint about the cattle being within a couple of hundred feet from the Wapato area.

Parks goals for this area are to maintain the pastoral view by using integrated vegetative management practices without high labor costs. The 1981 Rooster Rock Master Plan suggests development of an interpretive trail connecting the day use area at Rooster Rock with Latourell Falls.

The current permit is Parks effort to improve management of this area. The permit will be reviewed at the end of the year to determine what additional provisions should be included or whether grazing should be terminated.

Parks will include interested parties (Native Plant Society and the Audubon Society and the Wildlife Federation) and experts as we review and update our management plan for this portion of the park.

REPORT ON OUR FIELD TRIP TO ROOSTER ROCK STATE PARK WETLANDS

The NPSO field trip of July 28th, 1990, to the wetlands of Rooster Rock State Park (south of I-84) revealed to all the shocking degradation of these wetlands caused by ongoing cattle grazing.

Thirty-one people walked along the dirt road parallel to Mirror Lake, then through the barbed wire fence into the wetlands beside Young Creek. The participants were appalled by the disgusting morass created by cattle in the soft wet earth and by the destruction of native plants such as Wapato. In some areas along Young Creek, all plant life had been trampled or eaten away, leaving only churned mud and cowpies.

Some of the group made a short excursion to Latourell Creek where cattle cannot easily go. Along Latourell Creek were only the light tracks of deer, raccoon, and beaver. Several people remarked about the beauty of this natural scene.

Participants in this field trip included representatives from Portland Audubon, National Wildlife Federation, The Wetlands Conservancy, Friends of the Columbia River Gorge, Mazamas, Trails Club, and the NPSO was represented by Portland Chapter president Mike Fahey. Jack Wiles, the new Region 1 State Parks Supervisor, was an important participant. Also of importance was the presence of Gay Greger, a member of the State Parks & Recreation Commission.

Jack Broome's (The Wetlands Conservancy) bird list for this 1.5 hour trip included an osprey, two great blue herons, kingfishers, tree and violet green swallows, a pair of northern orioles, common yellow throat, mallards, wood ducks, great horned owl, and song sparrows.

A very partial plant list included Wapato (one seen in bloom), *Lysimachia ciliata*, *Veronica scutellata*, *Myosotis laxa*, *Scutellaria lateriflora*, *Potentilla rivalis*, *Potentilla anserina* (one in bloom), and *Helenium autumnale* (a few seen in bloom).

Although State Parks gives vegetation management, including control of blackberries, reed canary grass, and thistles, as its reason for allowing cattle into these wetlands, it was obvious to all present that the greatest amount of all these was

in the most heavily grazed areas! Indeed, no evidence was found that the cattle had eaten the blackberry vines, even the tender green shoots. It was clear that, rather than controlling the unwanted vegetation such as reed canary grass, Himalayan blackberry, teasel, Canada thistle, and bull thistle, the cattle were themselves the agents for proliferation of these weeds into the wetlands.

If Oregon State Parks is really serious about vegetation management at Rooster Rock State Park, they will take strong measures to eliminate the expanding patch of Purple Loosestrife (*Lythrum salicaria*) near Young Creek. This plant is widely known to be a dire threat to any wetland. If anything its spread is fostered by cattle grazing.

Some of the group felt that the real reason for allowing the grazing of the state park may be rooted in the fact that several present and former state parks officials live in the Corbett area. Offering this low-cost or no-cost grazing to local farmers may have been their way of ingratiating themselves and state parks with the Corbett community. That this "good neighbor policy" is carried out at the expense of the finest wetland complex in the Gorge has apparently been of little importance to Oregon State Parks. Hopefully this will change soon.

It was unanimously felt by the environmental representatives and by Lois Kemp (Botanist, Mt. Hood National Forest) that all grazing should be terminated in the park, and that no new (1991) grazing permit should be issued. New State Parks Region 1 Supervisor Jack Wiles suggested formation of a study group with strong environmental representation to develop a management plan for the Rooster Rock State Parks wetlands, including the option of no grazing.

NPSO members will be kept abreast of developments in this matter. Be assured that your letters will be needed again.

---Russ Jolley, Portland Chapter

Eunymus occidentalis
Western Wahoo

Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist
University of Washington Press



BITS AND PIECES

—News and Information From All Over

BLM WILDERNESS STUDY AREAS FIELD TRIPS

The Vale District Bureau of Land Management is offering 5 days of guided field trips to six different Wilderness Study Areas (WSAs). Dates are September 8th through 12th. These are day hikes with car camping between. You may participate in a single dayhike or several hikes and take part in the campouts. Talks and discussions related to the field trips will be held at lunch and in the evening. Some of the WSAs to be visited are noted for high concentrations of threatened and endangered plants, and all have striking geology. The areas are of great natural value, and participation in this series of tours may help in their preservation!

All the hikes are of intermediate difficulty. You will need to provide all your own camping supplies. The BLM can provide transportation from Vale if necessary. For more information, contact BLM Vale District Wilderness Specialist Rich Conrad at 503-473-3144.

ONRC CONFERENCE AT BREITENBUSH

The Oregon Natural Resources Council's 18th Annual Natural Resources Conference will be held Friday, September 7th to Sunday, September 9th at the Breitenbush Resort. This meeting will feature as speakers Democratic Gubernatorial candidate Barbara Roberts, Senator Bob Packwood, and Congressional candidate Mike Kopetski, among others. Workshops, hikes, and sessions with several prominent environmentalists round out the agenda. For a brochure and registration form, contact ONRC's offices at 223-9001 in Portland or at 344-3590 in Eugene.

Acer gandinianum
Bigtooth Maple

Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist
University of Washington Press



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BULLETIN

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GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome. **Deadline:** Copy is due with the editor by the 10th of the month. **Text Format:** Submissions can be in any form. Camera-ready copy should be in 3,334 in. wide columns up to 9.3 in long, with spacing between columns .22 in. The *Bulletin* uses 12 point "Times" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article posted inside their favorite field guide. **Computer Disks:** The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details. **Illustrations:** Line drawings and high contrast B&W prints are useable. Contact the editor about our current needs, or send along with your article. **Credits:** If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Names: Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock et al., if appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available). **Return of Originals:**

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

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Address _____	Is this a change of address? _____
	If so, please write your Old Address here: _____
City _____ State _____ Zip+4 _____	
Phone (Home) _____ (Work) _____	City _____ State _____ Zip _____

* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New	() Renewal	() Quarter Membership (Sep.-Dec.) \$3.00	() <i>Bulletin</i> Subscription only \$12.00
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* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Send change of address notices to:
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Bulletin of the

NATIVE PLANT SOCIETY OF OREGON

Dedicated to the enjoyment, conservation, and study of
Oregon's native vegetation

VOLUME 23 NUMBER 10

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSS activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

7 Oct., Sun.

FIELD TRIP up the Umatilla River for fall color, etc. Leave at 8am from the BMCC greenhouse.
Leader: Ruth Rouse.

12 Nov., Mon.

MEETING. 7:30pm in Room 130, Morrow Hall, BMCC. Bring slides from your summer.

Corvallis

8 Oct., Mon.

MEETING. 7:30pm at the Herbarium Library, Room 4081, Cordley Hall, Oregon State University. Bruce McCune will be our guest speaker with a talk entitled "The Role of Lichens in Oregon's Old Growth Forests".

7 Oct., Sat.

FIELD TRIP for a Cascade Mountains Mushroom Hunt. Leave at 8:30am from the parking lot across from the Monroe St. Beanery. Bring lunch, appropriate clothes, and collecting equipment. Contact Dan Luoma (758-8063) for more information, including new date. New date also available at the meeting on the 8th.

12 Nov., Mon.

MEETING. 7:30pm at the Herbarium Library, Room 4081, Cordley Hall, Oregon State University. Our guest speaker is Boone Kaufmann speaking on "Maintaining and Restoring the Biological Diversity of Rangeland Ecosystems".

Emerald

8 Oct., Mon.

MEETING. 7:00pm at Westmoreland Community Center, 1545 W. 22nd. Warren Pavlat will show slides on the Vegetation in Australia.

12 Nov., Mon.

MEETING. 7:00pm at Westmoreland Community Center, 1545 W. 22nd. Ken and Robin Lodewick will present "Texas vs. Canada".

High Desert

For information, call Bill Hopkins (388-7434).

Mid-Columbia

3 Oct., Wed.
and

MEETING. 7:30pm at the Mosier School. Don Eastman, author of the newly released book, "Rare Endangered Plants of Oregon" will be our guest speaker. We will see a sampling of his fine photography from his extensive travels and botanical research.

7 Nov., Wed.

MEETING. 7:30pm at the Mosier School. Berta Youtie of The Nature Conservancy will present a program on GRASSES; the most significant native grasses of Eastern Oregon. Taxonomy keys will be used to identify physical specimens.

North Coast

11 Oct., Thurs.

MEETING. 7pm at the State Office Bldg., 3600 3rd St., Tillamook. Jaylen Jones will give a talk on poisonous mushrooms.

20 Oct., Sat.

FIELD TRIP. Jaylen Jones will lead us on a trip to study and observe mushrooms at Fort Stevens State Park. Leave 9am from the Cornet lot, or meet at Coffinberry Lake parking lot at 10:30am. For information call Al Krampert (842-2308).

Portland

6 Oct., Sat.

FIELD TRIP for a full fantasy. South along the Pacific Crest Trail bordering the Washington Lava Beds. Leave at 8am from the NE 122nd and Sandy K-Mart parking lot. Second pick up will be at 9:15am from the parking area north of the Bridge of the Gods. Leader: Charlene Holzwart (284-3444).

9 Oct., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Jerry Igo, the Robin Hood of the Columbia Gorge, will present the first-of-its-kind video show & how-to, on producing video documentaries instead of slide show productions. Bring your check book along to reserve a copy of an adventurers view of Columbia Gorge wildflowers on video tape. The video contains over 200 plant species.

20 Oct., Sat.
State

FIELD TRIP to the wetlands along the Columbia at Beacon Rock. Leave 9am from Lewis & Clark Park. Leader is Maxene Wilson (655-1526). Wear boots or tennis shoes.

3 Nov., Sat.

FIELD TRIP with special guest leader, Dr. Robert Pyle. A trip to the Cathlamet White Tail Deer Refuge to study riparian habitats: weeds vs. native plants. Leave 8am from the west side parking lot of Montgomery Park on NW Vaughn St. For more information call Elizabeth Handler (244-5320).

Siskiyou

11 Oct., Thurs.

MEETING at 7:30pm in Room 171 of the Science Building at Southern Oregon State College. Russ Holmes, district Botanist for Roseburg BLM will speak on new species of Douglas County and other botanical wonders.

20 Oct., Sat.

MUSHROOM FIELD TRIP. (Call at least two weeks prior to the 20th as date is tentative according to rainfall.) Gordon Larum will lead a half day joint field trip with the Mount Mazama Mushroom Association. A choice of several collecting areas will be announced prior to departure. Mushrooms will be identified by species and whether edible or poisonous. Meet at the Food for Less parking lot at 8am. Information (772-1685). (Difficulty: easy)

South Coast

For information on formation of this pending chapter, contact Jim Curran (396-4939)

Umpqua Valley

18 Oct., Thurs.

MEETING. Wildflower trails in Douglas Co. by Mildred Thiele. Tour of Herbarium. 7pm in the Douglas County Museum, just south of Roseburg, exit 123 off I-5.

20 Oct., Sat.

FIELD TRIP. The role of fungi in the forest community. 8am BLM parking lot, 777 Garden Valley Rd., Roseburg. we will drive to several sites, with short walks into the forest to examine woody conks, mushrooms and other fungi. There will be in-the-field interpretation of the fungi's role in the forest community. If there were no fungi.....there would be no trees.....no forest.....no lumber industry. For information, call Jack Hausouer (874-2462).

Willamette Valley

To hear about unscheduled mid-week trips to places near & far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).
15 Oct., Mon.

MEETING. 7pm at Room 225, First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State St). Linda McMahan, Executive Director of the Berry Botanic Garden, will give a slide lecture on "Native Plants in the Berry Botanic Garden".

6 Oct., Sat.

FIELD TRIP to Jefferson Park for the fall colors in the high country. Approx. 5 miles each way. Number of hikers limited due to wilderness regulations, call trip leaders to register. Leaders: George and Harriet Schoppert (859-2613, Stayton).

William Cusick

15 Oct., Mon.

MEETING. 7:30pm at the Forestry and Range Sciences Laboratory, 1401 Gekler Lane. Paula Brooks, Forest Botanist for the Willowa-Whitman National Forest, will present a program on threatened and endangered plants of the Willowa-Whitman National Forest.

NEW OFFICERS FOR CORVALLIS CHAPTER

President----Nancy Weber, 2160 NW Beechwood Place, Corvallis, Or., 97330 (753-9626).

Vice-President----Esther McEvoy, 3290 SW Willamette, Corvallis, Or., 97330 (754-0893).

Secretary----Phil Hays

Treasurer----Thomas Kaye

EDUCATION COMMITTEE MEETING

This will be on Sunday, October 28th at 1pm, at Esther McEvoy's home at 3290 SW Willamette, Corvallis (754-0893). We will review progress to date and finalize an outline of the "Flowers of Oregon" slideshow. Anyone interested in helping on this project is welcome to attend this meeting or call me (Esther McEvoy, 754-0893) and see how you can help with this educational program.

CORVALLIS CHAPTER MEMORIAL DONATION

The Corvallis Chapter has made a donation in memory of Lynette Dillon (1934-1990) to the Greenbelt Land Trust. Lynette was an active member of the Corvallis Chapter, both as a chapter officer and as an active participant in our field trips. Lynette was also active in the local Audubon chapter and was an excellent photographer.

The first land acquisition of the Greenbelt Land Trust is an addition to the bald Hill Park in Corvallis. On the north side of Bald Hill there is a remnant of the native grass prairie that once covered the Willamette Valley. Very little remains of this habitat type due to farming and urbanization. The largest known population of the rare Willamette Daisy (*Erigeron decumbens*) exists here.

---Esther McEvoy

1990 RARE, THREATENED AND ENDANGERED PLANT CONFERENCE

Oregon's biennial Rare, Threatened and Endangered Plant Conference will be held this November. The conference has been held every other year since 1980, to review the status of rare plants in Oregon. This year, for the first time, the Conference will be jointly sponsored by the Native Plant Society of Oregon, the Conservation Biology Program of the State of Oregon (also known as the Oregon Department of Agriculture Endangered Plant Species Program), the Oregon Natural Heritage Program and the University of Oregon.

The meeting has been scheduled for Friday and Saturday, November 30 and December 1, at the Erb Memorial Union (the Student Union building) of the University of Oregon in Eugene. If there is interest, we will plan on a dinner (banquet) on Friday evening. Associated with this meeting on Thursday, November 29, will be a workshop for professional botanists.

The tentative schedule for the Conference is to review the status of all plants which are candidates for listing under the federal (US Fish and Wildlife Service) and state (Oregon Department of Agriculture) programs on Friday, November 30, and finish up on the taxa of significance in Oregon on Saturday, December 1. For people who can only attend the conference on one day, we will be willing to discuss candidates on Saturday and Oregon species on Friday.

We also intend to reorganize and then reprint the booklet, "Rare, Threatened and Endangered Plants and Animals of Oregon". The one potential outcome is a joint, NPSO-ORNHP status for all of the plants of interest. We will discuss this, the format for the book, rare plant studies, the Oregon Flora, and other botanical issues on Saturday after we finish up with the list.

There will be a \$5.00 registry fee, which will help defray the costs of the conference. All attendees registering for the conference will be mailed a copy of the 1991 publication at no cost. Anyone interested attending should send a note with the registrants name, address, phone number, the days you plan on attending and interest for the Friday night banquet, to:

Bob Meinke
Natural Resources Division
Oregon Department of Agriculture
635 Capitol St. NE
Salem, OR 97310-0110

This will allow us to determine how many people plan on attending. If you wish, you can send a check for \$5.00 per attendant, made out to the Native Plant Society of Oregon to Bob Meinke at the same address along with your name, address, etc.

---Jimmy Kagan

DONNER UND BLITZEN WILD AND SCENIC RIVER MANAGEMENT PLAN UNDER DEVELOPMENT BY THE BLM

The Bureau of Land Management has embarked on the planning process for the newly established Donner und Blitzen Wild and Scenic River. The initial step is to prepare a Resource Assessment. They are asking for public input on what values this area has.

The estimated 22,862 acre protected area includes the Donner und Blitzen River and its tributaries, Indian Creek, Little Blitzen River, and Fish Creek. The area is southwest of Malheur National Wildlife Refuge.

The area has high botanical value. This is little recognized due to the area's remoteness from population centers. The river system drains the west slopes of Steens Mountain. The entire area, which is very rugged, is little disturbed by human activity outside of grazing and the very rough Steens Mountain Road. Within the designated protected river corridor elevational gain results in progression from lowland sagebrush/bunchgrass communities to upper subalpine zones. A number of R&E plants find homes in the high Steens, including seven endemics.

The 72.7 protected miles of Wild and Scenic River varies in width. Exact boundaries will not be determined until finalization of the management plan. The interim plan shows boundaries mostly less than .5 miles wide, with some areas up to 1.5 miles wide. The boundaries cover primarily what is visible from canyon bottoms. It is important to note that both plants and animals occupy land out of the canyons and can only be fully protected by preserving land surrounding the canyons. It is these lands around the Wild and Scenic River corridor that could receive Wilderness designation or otherwise be protected from development---thereby reserving an ecological significant block of Steens Mountain.

The rivers still have high populations of native redband trout and other fish that elsewhere are scarce due to siltation from logging, agriculture and roadbuilding. Ravens, Prairie Falcons, Great Horned Owls and Turkey Vultures, among others, nest in the area. BLM states that 250 wildlife species use this area.

Four Wilderness Study Areas (WSAs) overlap the boundaries of the Wild and Scenic River corridor. These are the High Steens, the Little Blitzen Gorge, The Blitzen River, and the South Fork Donner and Blitzen River WSAs. Their are two Research Natural Areas (RNAs) here, the Rooster Comb and the Little Blitzen. These two were established according to the BLM to protect botanical values (i.e. R&E plants). And finally, the Steens Scenic Area of Critical Environmental Concern was established to protect visual resources. This plethora of potential wilderness areas and other protected areas have the potential in combination with the already-in-force Wild and Scenic River designation to allow wide-ranging protection for a significant chunk of what is now some of Oregon's least disturbed and valuable wildlands.

The Donner und Blitzen area has a very interesting geological history. Steens Mountain is the northernmost fault-block mountain in the Basin and Range province, and the largest fault block in the state of Oregon. Surface rock is mostly Steens Basalt, with some andesite and volcanic tuffs. The glaciation of the upper 2,000 ft. of the Steens is unique in the Basin and Range province, a region of desert mountains and valleys. The resulting U-shaped valleys are spectacular scenic assets. They are textbook examples and indeed photos of Kiger Gorge often show up in geology texts.

Portions of the Oregon High Desert Trail follow the river valleys. A backpack or horseback camping trip through the Wild and Scenic Rivers area can take several days. A network of trails covers the areas between the four arms of Wild and Scenic River. The scenery is dramatic and quite different from the Cascades. One can easily cross through several climate and vegetation zones in one trip, from near desert to alpine.

The BLM has produced a fairly good Resource Assessment for the Donner und Blitzen National Wild and Scenic River. They show awareness of scenic, wildlife, geologic, recreational and historical factors. However, they mention botanical values only in passing, never discussing it independently from other factors. This shortcoming needs to be corrected.

Protecting a ecologically significant portion of the Steens Mountain area is possible, given the Wild and Scenic River designation (stretching from Malheur Nation Wildlife Refuge into the high glaciated valleys of the Steens) and the seven WSAs, RNAs, and ACEC which would, if seen through to full protective status, cover much of the area.

A related issue is the planned 1991 upgrading by BLM of Steens Mountain road, currently a somewhat daunting drive. More campgrounds along the road are also in the works. The BLM is aiming to increase recreational use of the region. Any work in the area, due to its relatively undisturbed nature, needs to be carried out extremely carefully in respect to unnecessary disturbance, siltation human impact.

NPSO members can contact the BLM directly with concerns about the Donner und Blitzen Wild and Scenic River planning process, currently in its Resource Assessment stage. It is important to assert to them that botanical values must be assessed in detail, that the relatively undisturbed nature of the area must be taken into account, and that the entire area, mostly under BLM management, should receive recognition and planning as a single ecosystem, as it all is part of a single watershed. Deadline is October 19th.

Contact Fred McDonald at 503-573-5241 or write: Bureau of Land Management
Burns District Office
HC 74-12533 HWY 20 West
Hines Or. 97738
Attention: Glenn T. Patterson

The following 4-1/2 pages contain a series of articles on the Rooster Rock wetlands grazing issue. The first article is the Oregon State Parks position paper on the subject, repeated from last month's *Bulletin*, followed by three responses to it from different groups.

ROOSTER ROCK STATE PARK GRAZING ISSUE

Rooster Rock State Park, in the Columbia River Gorge, encompasses approximately 873 acres. The park is located on both sides of the I-84 freeway with the main day use area located between the Columbia River and the freeway. A portion of the area south of the freeway is under permit with Robert McMillen for grazing.

The grazing issue at Rooster Rock State Park has been controversial since the mid-1970s. At that time, a request was made from an adjoining landowner to lease land for grazing purposes. The concern over grazing had to do with the fact that there were several wetland areas within the land south of the freeway, as well as an area with an uncommon water plant, Wapato. Wapato was once thought to be threatened in Oregon.

At that time, State Parks sought the advice of the Oregon Fish and Wildlife Department and others who indicated that controlled grazing could offer some benefits to wildlife as well as vegetation management as long as the wetland areas and Wapato areas were protected. A task force appointed by Governor Straub to study Columbia Gorge issues also agreed that a controlled grazing program would be a compatible use of the property. As such, Parks issued a grazing permit and the property has been grazed since that time.

In September of 1989, the Parks Master Planning Unit identified significant natural and wetland areas and made recommendations regarding the grazing permit. These recommendations were incorporated into the 1990 permit for grazing use and include the following:

1. Repair of existing fences as well as construction of additional fences to protect wetland and riparian areas.
2. Control of blackberry, ash, thistle and other noxious weeds.
3. Development of a grazing plan in coordination with the Oregon State University Extension

Service which will include a schedule for cattle rotation and the number of cow/calf pairs that may be grazed on the property.

The permittee has been very cooperative in accepting the additional conditions that have been placed in the permit. This is evidenced by the fact that he built a fence to totally exclude the cattle from a large area of the pasture after a recent complaint about the cattle being within a couple of hundred feet from the Wapato area.

Parks goals for this area are to maintain the pastoral view by using integrated vegetative management practices without high labor costs. The 1981 Rooster Rock Master Plan suggests development of an interpretive trail connecting the day use area at Rooster Rock with Latourell Falls.

The current permit is Parks effort to improve management of this area. The permit will be reviewed at the end of the year to determine what additional provisions should be included or whether grazing should be terminated.

Parks will include interested parties (Native Plant Society, the Audubon Society and the Wildlife Federation) and experts as we review and update our management plan for this portion of the park.

'WHILE OREGON ON ONE HAND IS REWARDING RANCHERS AND FARMERS FOR KEEPING THEIR CATTLE OUT OF STREAMS AND WETLANDS, PARKS IS INTRODUCING CATTLE INTO THESE FRAGILE AREAS AT ROOSTER ROCK'

THE WETLANDS CONSERVANCY WEIGHS IN.....

TO: Chairman and Commissioners
Oregon State Parks and Recreation

FROM: John W. Broome
The Wetlands Conservancy

As a participant in a recent "environmentalist" tour of the Rooster Rock State Park wetlands, I want to add my views to those already expressed by others in attendance.

I must say that as a wetland owner and steward I take a dim view of the use of cattle as a weed control measure. I have seen too many examples of wetland destruction from horse or cattle graz-

ing, and it is ironic to note that the work of the Governor's Watershed Enhancement Board deals mostly with the protection of streams and riparian vegetation from damage by grazing cattle.

The Oregon Riparian Tax Incentive Program (ORS 308.025) was established specifically to provide tax incentives to farmers and ranchers to build fences to keep cattle out of the state's streams and riparian corridors. Improved water quality, wildlife habitat, soil erosion or compaction and other benefits are envisioned. Property eligible for tax exemption is the land extending 100 feet outward from the stream edge.

While Oregon on the one hand is rewarding ranchers and farmers for keeping their cattle out of streams and wetlands, the Parks and Recreation Department is introducing cattle into these fragile areas at Rooster Rock State Park and perhaps elsewhere.

After having walked the area in question and seeing the damaged wetland plants including Wapato, which is not too common anymore, and seeing the quagmire of trampled wetlands and streambeds, I find it hard to imagine how anyone can seriously make a case for the use of cattle in Rooster Rock State Park.

The noxious vegetation that has invaded the grazing areas is graphic and irrefutable evidence that cattle do not control blackberries, reedcanary grass, or thistle. These do, on the other hand, graze the tops off the willows, ash, rushes, and Wapato that are native to the wetlands.

I have a very telling slide photograph taking looking down the fence line separating grazed from not grazed land. Reedcanary grass, thistle and blackberry are profuse on the "cattle" side of the fence while on the other side is an open meadow of native species with some noxious plant invasion near the fence line. The *Oregonian* picture of Mr. Russ Jolley, standing at another part of the fence line is even more graphic and damning with its morass of cattle trampled mud along the fence line.

This cattle grazing practice in the Rooster Rock wetlands simply has to be stopped. There are other ways to control noxious weeds and the cattle method is not working in any case.

These wetlands with their spectacular backdrop of Crown Point is a rare gem of an ecosystem that

should be protected and managed for its wildlife and human enjoyment values.

To perpetuate cattle grazing in this area simply because it has been done there for "X" years in the past or because it provides a sylvan scene for the people traveling 65 miles an hour (or faster) on US 84 is not justified. Cattle grazing in wetlands was a bad farming practice in the past and it is still a bad practice. If we are to speak of historic uses, open wetland meadows and riparian vegetation prevailed in this part of the Gorge for thousands of years before the white man chose to master nature at all cost.

I take issue with the view that it would be costly to restore the native wet meadows. Other than removal of the man/cattle induced non-native species, the area would restore itself. Nature does far better at healing its wounds than man gives it credit for. I urge each and every member of the State Parks Commission to come tour this area with us to see for yourselves the damage caused by the cattle grazing practice. It should be done now before the fall rains set in...or perhaps we should wait. It will look much worse after the rains start.

Tour or no tour, I plead with you to halt this practice with the conclusion of the grazing agreement in December of this year.

ALTHOUGH THE NWF IS GLAD TO HEAR STATE PARKS CONCUR IN THE VALUES OF THE WETLANDS AT ROOSTER ROCK, THIS CONCERN IS DIFFICULT TO DISCERN FROM THE AGENCY'S ACTIONS.

.....AND THE NATIONAL WILDLIFE FEDERATION.....

TO: Larry Jacobsen, Deputy Director
Parks and Recreation Department

FROM: Bruce Apple, Director
National Wildlife Federation

This letter is in reply to your "response to the National Wildlife Federation's (NWF) concerns over grazing at Rooster Rock State Park. Although the NWF is glad to hear that State Parks concurs in the values of the wetlands at Rooster Rock, this concern is difficult to discern from the agency's actions.

The conservation community of Portland has been instrumental in protecting the esthetic beauty of the Columbia Gorge in cooperation with federal and state agencies. Even given this cooperation and effort, in many cases by volunteers, State Parks insists upon subjugating public enjoyment and benefit to the economic benefit on one individual.

Your letter alludes to using grazing to "control the invasion of brush in the open areas" and "as a means of vegetative control." As indicated in earlier letters and testimony, which have apparently been ignored, this reasoning is not scientifically supportable. Cattle in fact promote the invasion of brush, blackberries, reed canary grass, and other exotic species. According to experts in both Range and Water Resources Departments at Oregon State University, "Grazing causes disturbances and allows blackberries to invade and expand coverage...blackberry is an increaser on grazed habitat...and cattle have not been found to be very effective at controlling brush."

Moreover, your "response" speaks of providing public access for "enjoyment of the open space" and loss of "open space potential for recreational use" if cattle are removed. As an organization whose members have been deeply concerned with the protection of the Gorge and its natural heritage, the National Wildlife Federation finds this language extremely offensive. The NWF would be interested in obtaining information outlining the potential uses of the "open Space" created by the cattle. The only current use from our perspective would be "cow-pie" dodging.

Most members of the NWF and other conservation organizations, which have been instrumental in protecting the Gorge, are interested in native, natural characteristics. The presence of cattle on Rooster Rock State Park destroys these characteristics, causes visual degradation, offensive odors, and prevents public access. Due to the current lack of signs and access, and the shoddy appearance of the fencing and grazed wetlands, most of the public probably does not even know that the grazed areas are part of Rooster Rock State Park. The fences and grazing now present merely serve to block access and stifle public use of the wetland areas. If Parks is interested in providing further and better public access to this area, the cattle and fences should be removed, and a watchable wildlife areas set up in keeping with the nature and intent of Gorge preservation.

In addition, the "response" states that, "the grazed areas provide a characteristic pastoral scene which is in keeping with the scenic values of the Columbia Gorge". The letter continues by citing grazing as a historic use shown in a "photograph of the area, taken before construction of the Bonneville Dam". Parks believes that "letting these pastoral lands return to natural riparian woodland would mean the loss of the characteristic scenery of that area". All of these statements are oxymoronic. How could "letting pastoral lands return to natural riparian woodland" possibly destroy characteristic scenery? History did not begin when cattle were first grazed in the Gorge. Characteristic scenery for Rooster Rock is Wapato Wetland and riparian woodland. In fact, the construction of the Dam caused mass destruction of critical wetland habitat and only adds additional necessity to removal of the cattle and restoration of natural habitat at Rooster Rock.

Moreover, historical grazing practices of the type to which you favorably allude have wreaked untold havoc on public lands in the Western United States. Much of this damage occurred due to a lack of scientific information documenting the adverse effects of livestock grazing on range, riparian and wetland areas. Within the past half-century, however, information has become available showing that other management practices and the complete removal of livestock are the best method of preserving natural resource values. Recent historic livestock use of the wetland areas is no justification for its continued degradation from cattle grazing.

An even more disturbing implication of the statement that this so-called "characteristic scenery" must be preserved is that State Parks is will to ignore the stewardship responsibilities which ensue when land changes from private to public ownership. The grazing which occurred at the time of the photograph was taking place on private land. The National Wildlife Federation hopes that it is not Parks' policy to continue or renew destructive historical practices on sensitive land which comes under the Agency's management jurisdiction.

Mr. Jacobsen also contends that the grazing permittee "performs various maintenance tasks in return for his grazing right". These tasks provide nothing for the public. The permittee must repair fences and control noxious weeds. Neither of these tasks would be necessary if the permittee's cattle were not present.

Lastly, the "response" states that "restoration of these historically pastoral areas to native wet meadows would be extremely difficult and costly". This statement is ridiculous. The answer is simple. Remove the cattle when the grazing permit runs out in December. Remove the fences. And, selectively burn (which is more effective than grazing) or utilize other means to control noxious weeds. Such management will eliminate current management headaches.

The National Wildlife Federation hopes that State Parks will seriously consider the arguments put forth by the conservation groups involved in this controversy. At the very least, further information including a detailed map outlining grazing at Rooster Rock must be provided to interested parties. If planning is to be undertaken to develop a grazing program on the wetland it should only be done subsequent to removal of livestock after expiration of the current grazing permit in December 1990. Users should also be providing better access to these unique wetland areas of Rooster Rock State Park.

Many conservation organizations have placed significant effort and resources from a limited source into Gorge protection. State Parks' current non-responsive attitude and coddling of a private concern defies the public interest. The National Wildlife Federation is interested in obtaining some answers to current problems not further justifications and rationalizations.

We hope to hear from you soon.

'IT WAS ONLY AFTER THE NPSO AND THE LEWIS & CLARK TRAIL COMMITTEE PROTESTED THE GRAZING DAMAGE IN 1977 THAT OSP BEGAN TO NOTICE THE PROBLEM'

.....AND THE NPSO ADDS A FEW CHOICE WORDS FROM RUSS JOLLEY

AN ANALYSIS OF THE OREGON STATE PARKS POSITION PAPER ON GRAZING AT ROOSTER ROCK STATE PARK

Claim: "The concern over grazing had to do with the fact that there were several wetland areas

within the land south of the freeway, as well as an area with an uncommon water plant, Wapato."

Fact: This claim is completely untrue. We challenge OSP to produce dated documents to support their claim. In fact, OSP had no concern whatsoever for either Wapato or wetlands. A fence was built around the area to be grazed, i.e., all OSP land east of Mirror Lake between I-84 and the railroad. There were no interior fences at all to protect wetlands or Wapato. It was only after the Native Plant Society and the Lewis & Clark Trail Committee protested the grazing damage to wetlands and Wapato during the summer and fall of 1977 that OSP began to take notice of the problem.

Claim: "Wapato was once thought to be threatened in Oregon".

Fact: From the report of The Nature Conservancy to the Columbia River Gorge Commission (January 1989), we quote: "Wapato had long been considered a sensitive species by Oregon Natural Heritage Data Base, but has recently been dropped as it is now covered by the *Sagittaria* (Wapato) Marsh Association, which is considered endangered in Oregon."

Claim: "...Oregon Fish and Wildlife...indicated that controlled grazing could offer some benefits to wildlife...as long as the wetland areas and Wapato areas were protected."

Fact: In 1977, ODFW, like OSP, was totally unconcerned about protection of wetlands and Wapato from grazing at Rooster Rock State Park. ODFW, represented by Del Sanford, held that grazing would increase forage for geese, as it does at Sauvie Island. As it turns out, however there has been little use by geese during the 14 seasons of grazing. In over 70 visits to the area since grazing began, I have seen geese only a few times and then only in groups of 2-4. The use of the area by other wildlife also appears to be little changed, at least to the untrained eye.

Claim: "A task force appointed by governor Straub...also agreed that a controlled grazing program would be a compatible use of the property."

Fact: Environmental organizations were not represented on any governor-appointed task force dealing with grazing at Rooster Rock State Park.

Claim: "...recommendations were incorporated into the 1990 permit for grazing use and include the following:

1) Repair of existing fences..."

Fact: In 1990, cattle were in the park long be-

fore the fences were repaired. Even at the time of the July 28th field trip, a critical fence remained down, as it had for the past 10 or 12 years.
"2) Control of blackberry, ash, thistle, and other noxious weeds".

Fact: Ash is not a noxious weed, but a valuable native tree, an important component of the natural riparian forest along the Columbia River. Some of the ash trees at Rooster Rock State Park reach diameters of over three feet. Note also that by far the greatest concentrations of noxious weeds such as blackberry, thistle, and tansy ragwort are located on the heavily grazed area (formerly private) at the east end of the park.

Claim: "Parks goals for this area are to maintain the pastoral view by using integrated vegetative management practices..."

Fact: The vegetative management practices of the past 14 years--grazing--have resulted in the further invasion of the wetlands by reed canary grass, Himalayan blackberries, teasel, and other weeds. The most significant vegetative management that OSP could accomplish would be to rid the park of the patch of Purple Loosestripe located near Young Creek. If left unchecked, this pernicious weed will take over the entire wetlands, crowding out valuable native plant species. Purple Loosestripe is useless to most forms of wildlife. Grazing will definitely not do this job.

Claim: "The 1981 Master Plan suggests development of an interpretive trail..."

Fact: In 1977, the Native Plant Society urged development of nature trails, with boardwalks and removable bridges. After 13 years we have only barbed wire fences and even barbed wire across the entrance stiles. The public has been intimidated out of this huge area of state park.

"Everyone needs beauty as well as bread, places to play in and pray in where nature may heal and cheer and give strength to body and soul alike".

---John Muir



Monkshead
(Aconitum)



Larkspur (Delphinium)
with upper sepal
spurred

Delphinium and Monkshead by Herm Fitz from
Dec. 1979 NPSO Bulletin.

BITS AND PIECES —News and Information From All Over

The Oregon Natural Resources Council and several other environmental groups are initiating The Oregon Coast and Ocean Conference, with the first annual meet this Oct. 12th-14th in Newport. The aim of the conference is to address environmental issues concerning Oregon's important coastal zone, and to discuss ways concerned individuals and groups can have an impact on these problems. Topics will include development, pollution, ocean mining, wildlife, and legal and political issues involving marine protection. A variety of experts and activists will share information, opinions, and experiences concerning our coastal regions and their protection.

The following has been excerpted from *The Segno Lily*, newsletter of the Utah Native Plant Society.

AN INNER VOICE

Agency personnel often see a lack of compliance with environmental laws and an over-utilization, rather than sustained yield, of resources. Many people get frustrated and some are troubled by an inner voice. We know how to cut forests ecologically and how best to graze cows, but sometimes these best management practices are far removed from the practices of one's own organization. What should we do? Should we be loyal to the organization which is usually very good to us, or should we be loyal to the public? Listen some more to the "inner voice". Subscribe to the new *Inner Voice*, an association of Forest Service employees for environmental ethics, PO Box 11615, Eugene, OR 97440.

Ecosystem Management: Rare Species and Significant Habitats, the Proceedings of the 15th Annual Natural Areas Conference, has been published as New York State Museum Bulletin 471. This conference included over 600 people involved with natural area science and management. The publication includes a wide variety of information on environmental issues surrounding biological resource scarcity. Cost is \$26.45 ppd. Contact: New York State Museum
Publ. Sales-3140 CEC
Albany NY 12230

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BULLETIN

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GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Submissions can be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in. long, with spacing between columns 22 in. The *Bulletin* uses 12 point "Times" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings and high contrast B&W prints are useable. Contact the editor about our current needs, or send along with your article.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion.

Scientific Name: *scientific Northwest* by Hitchcock et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available). **Return of Originals:**

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Address _____ Is this a change of address? _____
 If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
 Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New	() Renewal	() Quarter Membership (Sep.-Dec.)	\$3.00	() <i>Bulletin</i> Subscription only	\$12.00
() Student.....			\$ 8.00	() Sustaining.....	\$ 30.00
() Regular.....			12.00	() Patron.....	100.00
() Family Membership.....			18.00	() Life Member.....	500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund.....	\$ _____
Leighton Ho Memorial Award Fund.....	\$ _____
Rare and Endangered Plant Fund.....	\$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Send change of address notices to:
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Mary Falconer, Membership Chair,
1920 Engel Court NW,
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**NATIVE PLANT SOCIETY
OF OREGON**

Dedicated to the enjoyment, conservation, and study of
Oregon's native vegetation

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

5 Nov., Mon.

MEETING. 7:30pm in Room 148, Pioneer Hall, BMCC. Bring slides from your summer. Note change in date and place.

Corvallis

12 Nov., Mon.

MEETING. 7:30pm at the Herbarium Library, Room 4081, Cordley Hall, Oregon State University. Our guest speaker is Boone Kaufmann speaking on "Maintaining and Restoring the Biological Diversity of Rangeland Ecosystems".

Emerald

12 Nov., Mon.

MEETING. 7:00pm at Westmoreland Community Center, 1545 W. 22nd. Ken and Robin Lodewick will present "Texas vs. Canada". Our local penstemon experts will compare the flowers of the two areas. Robin and Ken know more about Penstemons than almost anybody! Come see their gorgeous slides and hear how they compare Texas with Canada.

18 Nov., Sun.

FIELD TRIP for mushrooms with Freeman Rowe. Bring basket, knife, paperbags and appropriate clothes. Leave from South Eugene High School at 8:30am. We will going to the Coast. For info, call Jenny Dimling (343-3242).

High Desert

For information, call Bill Hopkins (388-7434).

Mid-Columbia

7 Nov., Wed.

MEETING. 7:30pm at the Mosier School. Berta Youtie of The Nature Conservancy will present a program on GRASSES; the most significant native grasses of Eastern Oregon. Taxonomy keys will be used to identify physical specimens.

5 Dec., Wed.

MEETING. 7:30pm at the Mosier School. Jerry Igo will present his latest video production "Seasons in the Gorge".

North Coast

8 Nov., Thurs.

MEETING. 7pm at the State Office Bldg., 3600 3rd St., Tillamook. We will have a guest speaker talk about the Japanese beetle and the gypsy moth.

17 Nov., Sat.

FIELD TRIP. A walk on Bay Ocean Spit. Leave from the gate at 10am. For information call Al Krampert (842-2308).

Portland

3 Nov., Sat.

FIELD TRIP with special guest leader, Dr. Robert Pyle. A trip to the Cathlamet White Tail Deer Refuge to study riparian habitats: weeds vs. native plants. Leave 8am from the west side parking lot of Montgomery Park on NW Vaughn St. For more information call Elizabeth Handler (244-5320).

13 Nov., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Invite your friends to an evening with Dr. Geurrant from the Berry Botanic Garden. Dr. Geurrant will give a slide presentation on the Berry Garden and talk about the seed exchange program. For more info contact Tom Chereck Jr. (284-5156).

17 Nov., Sat.

TRANSPLANTING PARTY. We need to move about 200 Barrett's Penstemons for the second phase of the M.P. 68 restoration project on Interstate 84. Previous transplantings of this species have been highly successful. The highway department will prepare the new site with loose gravel 18 inches deep. Based on past experience, the whole operation should be completed in less than 3 hours, then we can head for hot soup at Pietro's in Hood River. Bring tools for digging (ice axes and hand rakes are excellent). Leave 9am from the 122nd and Sandy K-Mart parking lot. Otherwise, come to the Mosier Interchange (M.P. 69 off I-84) anytime after 10am.

Siskiyou

8 Nov., Thurs.

MEETING at 7:30pm in Room 171 of the Science Building at Southern Oregon State College. Barbara Williams will give a botanist's perspective of biodiversity in the Klamath National Forest of

California.

South Coast

For information on formation of this pending chapter, contact Jim Curran (396-4939).

Umpqua Valley

15 Nov., Thurs.
own

MEETING. 7pm, Indian Room, Campus Center Building, Umpqua Community College. Bring your slides of Douglas County natives. Short plant ID sketch plus field trip reports. Take exit 219 off I-5, 5 miles north of Roseburg.

17 Nov., Sat.

FIELD TRIP. Explore Douglas County's plant diversity. Meet 8am BLM parking lot, 777 Garden Valley Rd., Roseburg, for carpooling trip to Twin Lakes with stops at Colliding Rivers and Horseshoe Bend. Leader: Richard Sommer (673-3709).

Willamette Valley

To hear about unscheduled mid-week trips to places near & far, call Clint Urey (581-1805) or Barbara Halliday (371-1025).

19 Nov., Mon.

MEETING. 7pm, Room 225, First United Methodist Church, corner of SE Church and State Sts., Salem (use the NE entrance on State St.). David Dunlop will speak on Lane County's Roadside Vegetation Management Program, focusing on the variety of methods for dealing with vegetation on roadway rights-of-way's in what may be the first such innovative program in the nation.

William Cusick

For information, contact Karen Antell (963-0267).

SAVING OREGON'S REDWOODS, PART III: RE-CREATING, RESTORING AND ENHANCING OREGON'S REDWOOD FORESTS

This is the third in a series of articles by me on Oregon's coast redwoods, *Sequoia sempervirens*. In my first piece, which appeared here in February of this year, I wrote that redwoods are our state's largest and one of our oldest species. I stated that when the white man arrived, Oregon and California had perhaps 4 million acres of redwood forests, but that this has now been reduced by logging to only about 160,000 acres with most of the remaining trees in California. In Oregon, only about 720 acres of redwoods are protected and the rest, 600 acres on the Winchuck River, were scheduled to be cut this year. I asked readers to write to the Siskiyou National Forest to protest plans to cut these trees, and to request that all remaining Oregon redwoods be saved.

My second redwood article appeared here in April of this year. In that article I urged *Bulletin* readers not to be lulled into thinking that Oregon redwood logging had been halted. I reported that redwoods were still being cut daily on Forest Service land in Curry County and that we would have to be very vigilant if we were to prevent the loss of the remaining stands on Bear Ridge and Peavine Ridge in the Winchuck drainage.

In my letters to Siskiyou National Forest, I asked to be kept informed of all decisions regarding redwoods on the Forest. Having heard nothing from them by June of this year, I decided to write to Curry County to see the situation for myself.

Glen and I visited the Siskiyou National Forest on June 29 and 30 of this year. We saw clear evidence that redwoods were still being cut in June. On the Chetco and Winchuck roads, a good deal of fibrous red bark on the roadways was evidence that redwood logs were being hauled out. I feel quite certain that, outside the Brookings area, most Oregonians would be shocked to learn that the logging of redwoods was going on this spring and summer. I was informed by a local resident that these redwood logs were destined to be milled in California.

We camped at Loeb Park east of Brookings, and walked a mile up the Chetco to the Redwood Nature Trail. This pretty little hillside forest of mixed redwood and other species is lovely; however, it is touted in Forest Service press releases as "120 acres of redwoods." This, of course, is

not the case. Redwoods are scattered in the area and cover only a small percentage of the total acreage. Nevertheless, the trees present are beautiful, and some young trees are present as well, and we can be grateful that even these few trees were saved here on the Chetco. As we walked from Loeb Park, it was obvious that we were walking through a former redwood forest which, from the size of the stumps, must have been truly magnificent. Unfortunately, today, not even a redwood seedling could be seen all along this stretch of the river. And, amazingly, at the Redwood Nature Trail area, I saw not one redwood seedling beyond the boundaries of the protected area. After logging, this area had all been replanted with Douglas fir.

We drove east to see Wheeler Creek Research Natural Area. In Forest Service news releases, this RNA is said to be 336 acres in size. It is located approximately 10 miles from the coast, and may be quite close to the limits of the species' range. Again, the 336 acres of the RNA are not entirely of redwoods. This is an area of high diversity, mixed forest. Some of the redwoods in the RNA are quite striking in appearance, but to claim this represents 336 acres of protected redwoods is an exaggeration. In addition, the most disturbing feature of the Wheeler Creek area to me is that the RNA sits as a virtual island in the midst of clearcuts and so-called "managed forests," and it is clear that when these mixed forests of redwoods and other species were cut, the clearcuts were replanted, not as the highly diverse mixed forests they originally were, but as Douglas fir monocultures. Ronald McCormick, Supervisor of Siskiyou National Forest wrote to me last January: "...to maintain redwoods as a part of a healthy ecosystem, we need to have all age classes: seedlings, juveniles, middle-aged trees and old growth." Do *Bulletin* readers wonder, as I do, how the Forest Service proposes to maintain all redwood age classes, when they do not replant with redwoods when redwoods are logged?

After hiking in the Kalmiopsis Wilderness Area, Glen and I drove south and then west along the Winchuck River. Between the Winchuck and the California border are Bear Ridge and Peavine Ridge where, in both mixed and pure stands, most of Oregon's finest remaining redwoods grow. Peavine Ridge is only about 3 miles from

the coast and is fog-shrouded enough that many of the redwoods are truly magnificent in size. Also, in the Peavine area some vigorous natural regeneration of redwoods is taking place. I was very cheered by this sight and feel, as a long-time botanist and ecologist, that on these ridges, every effort must be made to preserve all remaining redwoods. In addition, I feel strongly that, in the previously cut parts of the Winchuck drainage, managed areas should be replanted with both redwoods and Douglas fir so that these wonderful high diversity mixed stands can be maintained.

My real reason for writing this third article in my series, is to urge all *Bulletin* readers to write the Siskiyou National Forest and urge them to begin now to re-create, restore and enhance redwood forests and mixed redwood forests in previously logged parts of Curry County. If, for example, redwoods were reintroduced into the Loeb Park Area and along the lower Chetco and lower Winchuck Rivers now, redwood forests of respectable size could be enjoyed there within half a century. Along with the restoration and reintroduction of redwoods along these rivers, there could be reestablished the sort of riparian redwood ecosystems which still exist in a few places in California. Most particularly, wildflowers now extinct in Oregon, such as the lovely *Clintonia andrewsiana*, could be reestablished in Oregon.

I have already suggested to a representative of Oregon State Parks, that they begin to plant young redwoods at Loeb Park and environs, especially between the park and the Redwood Nature Trail area. One would hope that the city fathers of Brookings might begin a redwood planting campaign for their town. Tourism is obviously the wave of the future for this most attractive part of our coast, and in not too many years, I can envision Brookings calling itself "the Gateway to Oregon's Redwood Empire," and collecting tourist dollars from those folks who spill over from the California parks.

If you feel as I do that Oregon deserves to have restored to her the beautiful redwood forests which have been taken away through careless logging practices, please write to: Ronald J. McCormick, Forest Supervisor, Siskiyou National Forest, 200 NE Greenfield Road, PO Box 440, Grants Pass, Oregon 97526-0242.

Oregon Redwoods Forever!
Rhoda Love,
Emerald Chapter

RARE PLANT CONFERENCE AGENDA 11/29 THROUGH 12/1 UNIVERSITY OF OREGON, EUGENE ERB MEMORIAL UNION

Thursday (federal agencies only)

- 9:30 a.m. -- 12 Noon
Discussion of government botany programs
12 Noon -- 1:30 p.m.
Lunch
1:30 p.m. -- 4:30 p.m.
Continuation of federal agency workshop

Friday

- 8:30 a.m. -- 9:15 a.m.
Registration and coffee
9:15 a.m. -- 11:45 a.m.
Discussion of federal and state listed and candidate species
11:45 a.m. -- 1:00 p.m.
Lunch break
1:00 p.m. -- 4:45 p.m.
Continued discussion of state and federal species; discussion of other species (i.e., non-candidates) as time allows
4:45 p.m. -- 7:00 p.m.
Dinner (non-hosted)
7:00 p.m. -- 10:00 p.m.
NPSO board meeting

Saturday

- 8:00 a.m. -- 8:30 a.m.
Coffee
8:30 a.m. -- 11:45 a.m.
Non-candidate species
(continued from Friday)
11:45 a.m. -- 1:00 p.m.
Lunch break
1:00 p.m. -- 3:30 p.m.
Open discussion -- topics will include format of 1991 rare plant booklet, the listing process, etc.

**1990 RARE PLANT CONFERENCE AT THE UNIVERSITY OF OREGON
SECOND NOTICE**

This is a reminder to the NPSO membership of the upcoming Rare Plant Conference to be held at the University of Oregon in Eugene on November 29 and 30, and December 1 (Thursday through Saturday) in the Erb Memorial Union. All NPSO members are invited and urged to attend, even if you do not happen to have specific information to offer on any of the species we are scheduled to review. The purpose of this biennial meeting is to give everyone an opportunity to come and hear about rare plant species, and to interact with the professionals and amateurs who manage and study these valuable natural resources.

The Conference will be similar to previous years, except that we have elected to provide more than a single day to discuss all the species on our various lists. On Thursday (November 29) there will be a pre-Conference meeting between public agency botanists to discuss government botany programs and agency sensitive species lists. On Friday morning we will begin the Conference in our traditional format, with everyone participating. To enhance the proceedings this year, we hope to have slides of many of the listed and candidate species to view as we progress through our discussion. We will focus on species with state and federal status on Friday, and then move on to non-candidate species Friday afternoon and finish up on Saturday. This should give us time for a relaxed general discussion on Saturday afternoon, something we have rarely had time for in the past due to the meeting being crowded into one day. If you have questions or concerns you would like to see addressed, this is the time to bring them up. We encourage NPSO members to participate in this discussion and to voice their opinions.

Rather than have a formal banquet on Friday night, as was hinted earlier, we will provide suggestions during the Conference concerning local dining establishments. There should be ample opportunity for groups to get together for informal socializing on both Thursday and Friday evenings.

As many of you may have noticed, we are asking for a \$5.00 registration fee from Conference participants this year. This is to defray costs of the 1991 version of **Rare, Threatened, and Endangered Plants and Animals of Oregon** (a copy of which will be sent to each registered conferee when it is completed next year), and to help with other incidental expenses associated with the meeting. Leftover money will be given to NPSO. You are of course welcome to donate more than \$5.00 when registering, with assurance that this money will go towards future rare and endangered plant work sponsored by NPSO. Unless you have already pre-registered by mail (see the October issue of the *Bulletin*), plan on bringing your \$5.00 with you on Friday morning, and **MAKE YOUR CHECK OUT TO NPSO**. If you do not pre-register, make sure you provide your name and address for our mailing list when you pay on Friday morning.

Contact Bob Meinke (378-3810 or 737-4106) or Jimmy Kagan (229-5078) if you have any questions about the Conference. We look forward to seeing a substantial NPSO turnout.

--Bob Meinke

Plant Conservation Biology Program
Oregon Department of Agriculture
635 Capitol Street NE
Salem, OR 97310-0110

WALLOWA-WHITMAN NATIONAL FOREST 1990 BOTANY PROGRAM

This year the Wallowa-Whitman National Forest began a forest-wide botany program to inventory and manage for Threatened, Endangered, and Sensitive plants. Botany surveys were conducted to search for and protect sensitive plants in timber sales, range allotments, road construction projects, wildlife burns, stream improvements, and recreation projects. Fifty-three new rare plant sites were found during these surveys. The work was done by a diverse mix of professional botanists, biological technicians, and forest service personnel specially trained to search for the target species. There was a total of twenty-six people working on surveys on the forest at least part-time during the summer. The lead botanists on the districts were: Dan Leavell on Baker District (BAK), Caroline Lindstedt on LaGrande District (LAG), Nick Otting on Pine and Unity Districts (PIN and UNI), and Marty Stein on the Wallowa Valley Zone (WAV), which includes Wallowa Valley District, Eagle Cap Wilderness and Hell's Canyon National Recreation Area.

our forest sensitive list. Another important find from LaGrande District was a male fern (*Dryopteris filix-mas*) site; this species has been found on the Umatilla National Forest, but this is the first time it has been found on the Wallowa-Whitman. The new locations of Bridge's cliff-brake (*Pellaea bridgesii*) are of note because two populations were found in the Elkhorn Mountains (one each on Unity and Baker Districts), whereas it had previously only been found in the Wallowa Mountains for Oregon (it is common in the Sierras of California). The twelve new sites of Henderson's ricegrass (*Oryzopsis hendersonii*) on the Wallowa Valley District were the result of a Challenge Cost Share Project with the Oregon Department of Agriculture and the Oregon Natural Heritage Data Base. Sue Viriakas specifically searched for this species in all potential habitat on the district. Before this summer there were only two known sites on the forest for this species.

New Rare Plant Sites Were Found for the following:

	BAK	LAG	PIN	UNI	WAV
Swamp onion (<i>Allium madidum</i>)		3		1	
Oregon bolandra (<i>Bolandra oregana</i>)					3
Rough harebell (<i>Campanula scabrella</i>)					1
Male fern (<i>Dryopteris filix-mas</i>)		1			
Stiff club-moss (<i>Lycopodium annotinum</i>)	3	8			5
Ground cedar (<i>Lycopodium complanatum</i>)		1			
Bank monkey flower (<i>Mimulus clivicola</i>)					5
Henderson's ricegrass (<i>Oryzopsis hendersonii</i>)					12
Bridge's cliff-brake (<i>Pellaea bridgesii</i>)	1		5	1	
Wallowa primrose (<i>Primula cusickiana</i>)					1
ID gooseberry (<i>Ribes oxycanthoides</i> spp. <i>irriguum</i>)		1	1		

These new plant sites represent a great increase in our knowledge of the range and distribution of rare plants on the forest. One of the more significant finds was the discovery of ground cedar (*Lycopodium complanatum*) near the Grand Rhonde River on the LaGrande District. This location is a major range extension for this species, previously only known in Oregon from four sites in the Northern Cascades. This species is considered threatened in Oregon, but more abundant elsewhere (Washington, Canada, and the east coast). It was not even on the sensitive list for our forest, but because of the sharp eyes of our botanists, we identified it and added it to

The forest had four important Challenge Cost Share Projects this season. The search for Henderson's ricegrass mentioned above will result in a draft species management guide to help us better manage this rare grass. A similar project was undertaken in cooperation with the Oregon Department of Agriculture to analyze habitat needs and status of Ross' avens (*Geum rossii* var. *turbidum*) in the Elkhorn Mountains. Bob Meinke was in charge of the field work and write up of this project. The two other cost share projects involve MacFarlane's four-o'clock (*Mirabilis macfarlanei*), which grows in the Hell's Canyon National Recreation Area. It is the only plant ac-

tually on the national endangered species list that occurs on Forest Service land in Oregon or Washington. One of these studies involved setting up monitoring plots to track population trends at one site. Field members on the project included Tom Kaye, Wes Messenger, and Susan Massey from the Oregon Department of Agriculture; Marty Stein, Randy Krichbaum, Jerry Hustafa, and Paula Brooks from the Wallowa-Whitman National Forest; and Roy and Rachel Sines from the Native Plant Society of Oregon. The other project was a chemical analysis of compounds produced by cheatgrass and their possible negative effects on the rare four-o'clock. Boise State University cooperated on this project.

All these projects and findings represent a great start for an exciting botany program on the Wallowa-Whitman National Forest. Next year we hope to find and protect even more sensitive plant sites. If any NPSO members are interested in working for the forest next season, please contact Paula Brooks at (503) 523-6391.

---Paula Brooks, WWNF

90-91 Siskiyou Chapter Officers

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Secretary/Treasurer:	Barbara Mumblo
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THE POWER OF SMALL THINGS

Traveling off the beaten track used to sound romantic. That was before we heard about cryptogamic soil.

This article by Marla Loe of the Aspen Center for Environmental Studies is from the Sept/Oct. edition of *Sego Lily*, Newsletter of the Utah Native Plant Society.

The information applies well in the dry areas of Eastern Oregon.

You've probably seen it, if you've ever strolled along a sandy path in Southern Utah. It looks in its youth like small black sandcastles pitted by rare desert rains, or, in maturity, a crusty dark moss.

Its cryptogamic soil. Left to its own devices, this unobtrusive black crust makes the desert stay put. Cryptogamic soil is a term used to describe a type of soil that has a high concentration of micro-organisms in it. It is primarily cyanobacteria (sometimes called blue-green algae), along with lichen, fungi and moss. It starts to form by covering the sand with what appears to be a dried mud crust. As it grows, it gets darker and thicker until it becomes about an inch thick. This process can take 50 to 100 years to complete.

Some scientists now think that life on our planet's land (as opposed to the water) began as far back as three billion years ago and that cyanobacteria were the world's first land dwellers. The theory maintains that these microbes were responsible for stabilizing loose rock and allowing the first wide-spread accumulations of soil. Cryptogamic soil is a live plant itself. Pour water on it and it will turn green before your very eyes!

Cryptogamic soil does many useful things. It:
*keeps sand from blowing or washing away
*provides a seed bed for new plants to sprout in
*creates a mulch for the plants that grow in it
*absorbs and holds water for plants
*makes atmospheric nitrogen available to plants

If you step on this plant, especially in hot weather, it breaks and crumbles easily. This leaves the area open to soil erosion by wind and water. Off-road vehicles and cattle are especially harmful to these soils; neither was designed to stay on roads or trails.

Damage to this fragile desert soil by humans, animals or vehicles can take 100 years to repair itself. As the signs to many trailheads exclaim: "Watch your step! Help keep cryptogamic soils alive by walking, riding bicycles and driving on existing trails and roads. Take a moment to examine it closely. Point it out to a child. It is one of the most ancient living forms on Earth. And let it continue to function as it has for hundreds of millions of years. Let it be".

90-91 Emerald Chapter Officers

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BITS AND PIECES

—News and Information From All Over

Treating Pinyon-Juniper Woodlands

Upset with aggressive BLM logging practices in the Northwest? Perhaps we should feel lucky that here at least they want trees to grow back. In Utah and other Great Basin states, public lands have been subjected to many years of chaining.

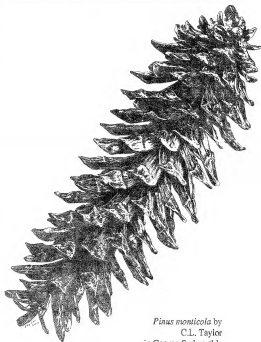
Pinyon-juniper woodlands consist of open stands of small shrubby pines and junipers, and are an important habitat for many plants and animals. The chaining of pinyon-juniper woodlands consists of pulling a heavy chain between two large bulldozers to eliminate the trees. This is often followed by rollerchopping, burning and spraying, leading to the final touch of cattle grazing. Current BLM plans call for "treating" 375,000 acres annually in this fashion. The BLM states that these activities are needed to "modify desired plant communities" by removing "undesirable plant species" (read: the native plant community). According to an analysis by the Southern Utah Wilderness Alliance, this costs \$320 for every \$1 of return. The purpose of this is to fit more cattle on the land. The BLM claims that this is beneficial to wildlife also, though how destruction of thousands of acres of wooded habitat that is required by many lifeforms does this is not obvious.

Available published research does not support the reasons given to justify chaining. Native American groups were among the first to speak out against this practice. Recent broad-based public opposition has jarred BLM enough to result in a delay in chainings in Utah until case-by-case analyses can be done. Environmentalists feel only continued public awareness and pressure will bring about any change in public policy.

"Cryptogam" is a latin-derived word that can be interpreted as meaning 'with hidden reproductive processes'. It is used to denote the older plant types such as mosses, lichens, algae, fungi and ferns. The lesser-known term "Phanerogam" denotes flowering and cone-bearing plants. It can be interpreted as meaning 'with visible reproductive processes'. Use of these terms is increasing with the widening understanding of the web of life and the importance of the many threads that make it viable.

Restoration Forestry & Beyond Conference

A New Forestry conference will take place Nov. 9-11 at Lost Valley Center near Eugene. Subject matter for the talks and forums will cover a wide range of forestry topics, including biodiversity, forest restoration and sustainability, and economic outlooks in sustainable forestry. Publicity for the conference asks "what are ecologically-sound forestry practices for the Pacific Northwest? What can we do, individually and cooperatively, to help reverse the present pattern of forest deterioration across the globe? Come and help answer these questions". For more information contact Michelle Thompson at Lost Valley Center, PO Box 111, Dexter Or. 97431 (503-937-3351). Cost, including lodging and meals, is \$195.



Pinus monticola by

C.L. Taylor

in George Sudworth's

Forest Trees of the Pacific Slope

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BULLETIN

EDITOR..... Bryan Boyce... 13285 S. Clackamas River Drive, Oregon City 97045-9411; 655-4457

GUIDELINES FOR CONTRIBUTORS

The NPSO Bulletin is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Submissions can be in any form. Camera-ready copy should be in 3,334 in. wide columns up to 9.3 in long, with spacing between columns 22 in. The Bulletin uses 12 point "Times" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article pasted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings and high contrast B&W prints are useable. Contact the editor about our current needs, or send along with your article.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize genus and species (underlining if italic is not available).* **Return of Originals:** Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Address _____ Is this a change of address? _____
 If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
 Phone (Home) _____ (Work) _____ City _____ State _____ Zip _____

* **DUES** include monthly NPSO Bulletin. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () Bulletin Subscription only \$12.00
 () Student.....\$ 8.00 () Sustaining.....\$ 30.00
 () Regular.....12.00 () Patron.....100.00
 () Family Membership.....18.00 () Life Member.....500.00

* CONTRIBUTIONS:

Jean Davis Memorial Award Fund..... \$ _____
 Leighton Ho Memorial Award Fund..... \$ _____
 Rare and Endangered Plant Fund..... \$ _____

* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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Send change of address notices to:
Native Plant Society of Oregon
Mary Falconer, Membership Chair,
1920 Engel Court NW,
Salem, Oregon 97304

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Bulletin of the

NATIVE PLANT SOCIETY OF OREGON

Dedicated to the enjoyment, conservation, and study of
Oregon's native vegetation

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CHAPTER NEWS

IMPORTANT NOTE TO FIELD TRIP PARTICIPANTS

Field trips take place rain or shine, so proper dress and footwear are essential. Trips may be strenuous and/or hazardous. Please contact the trip leader for information about difficulty, mileage, and terrain. Participation is at your own risk. Bring water and lunch. All NPSO activities are open to the public at no charge (other than carpool mileage), and friends, newcomers and visitors are always welcome.

Notice to field trip chairs and leaders: The Forest Service and other Federal agencies have set policies limiting group size in wilderness areas to 12. The reason for this is to limit the human impact on these fragile areas. As we are often in the position of asking them to follow their rules and regulations for conservation of our natural resources, it's time for us to do the same. Each group using wilderness must be no larger than 12.

Blue Mountain

3 Dec., Mon.

MEETING. 7:30pm in Room 130, Morrow Hall, Blue Mountain Community College.

Corvallis

10 Dec., Mon.

MEETING. 7:30pm at the home Tom Kaye, 4550 SW Nash, Corvallis. Bring a desert to share and slides or pictures to share.

Emerald

High Desert

For information, call Jennifer Dimling (343-3242)

For information, call Bill Hopkins (388-7434).

Mid-Columbia

5 Dec., Wed.

MEETING POSTPONED. Due to a conflict with the school's holiday program, December's program will be postponed until January. See below.

2 Jan., Wed.

MEETING. 7:30pm at the Mosier School. Jerry Igo will present his latest video production "Seasons in the Gorge", postponed from December.

North Coast

13 Dec., Thurs.

MEETING. 7pm Ed and Myra Stierberg's, 6970 Alderbrook Rd., Tillamook. Bring a "hot dish" for potluck dinner. RSVP 842-7499 or 842-7023 by Dec. 10th.

Portland

11 Dec., Tue.

MEETING. 7pm at First United Methodist Church, 1838 SW Jefferson St., Portland. Member's night. Everyone is especially welcome as we all show the unique and unidentifiable flowers we have seen over the past year. Please bring up to 10 of our unique or unidentifiable plant slides. A goodies potluck will be ongoing. If your last name starts with A thru H bring some cookies, I thru P bring some fruit or if Q thru Z bring 1/2 to 1 quart juice as we celebrate this annual event.

Siskiyou

13 Dec., Thurs.

MEETING. 7:30pm in Room 171 of the Science Bldg. at Southern Oregon State College. Recently returned from Yellowstone National Park, Dr. Paul Lemon, fire ecologist, will briefly discuss how, why and what happened in the summer of 1987 and then speak on vegetation recovery and the "let burn" policy for national parks.

South Coast

For information on formation of this pending chapter, contact Jim Curran (396-4939).

Umpqua Valley

20 Dec., Thurs.

MEETING. 7pm, 240 Vinyard Ln., Roseburg. Potluck--bring slides of Douglas County natives. Plan events for the coming year. Dress warmly. Call 673-3709 for directions.

Willamette Valley

For information, call Mary Anne Westfall (266-7967)

William Cusick

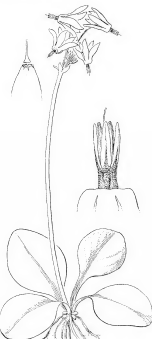
For information, contact Karen Antell (963-0267).

OUR RARE & ENDANGERED PLANT FUND

The R & E Fund is due for a new look. The Fund was founded many years ago to provide support for our rare and endangered species work. The Board has decided to rejuvenate it. This Fund will now operate as a separate entity and stand apart from our general fund. It will continue to support projects related to rare, threatened or endangered plants and disbursements will be controlled by the Board. A novel approach will be tried in the allocation of contributions to this fund. This method is perhaps best referred to as the "50-50" rule. One-half of all donations to this Fund will go into a capital account to accrue interest for future projects. The other fifty per cent will be available for projects that year. Any unused monies will revert into the capital account. The same strategy will control what happens to the interest from the capital part of the Fund. This will allow us to support projects while building a source for stable and ongoing funding in the future.

-----Stu Garrett, NPSO Past President, Eastside
Conservation Chair

Dodecatheon hendersonii
Drawing by Jeanne R. Janish in
Flora of the Pacific Northwest,
by Hitchcock and Cronquist,
University of Washington Press



THE EASTSIDE CONSERVATION REPORT

"HE WHO SLINGS MUD, LOSES GROUND"

At the September NPSO Board Meeting, the Board elected to divide the Conservation Chair into eastside and westside divisions. I have been given the opportunity to coordinate our efforts east of the Cascades. A westside co-chair will be named soon. I would like to bring NPSO members up to date on the important issues we face "on the dry side".

NEWBERRY NATIONAL VOLCANIC MONUMENT

The good news first! Oregon is now the home of America's newest national monument...and NPSO played an important role! Newberry joins the John Day Fossil Beds and the Oregon Caves as the third such designation in Oregon. The Newberry Monument is much larger than these previous designations and is of greater ecological significance. Over 60,000 acres will be protected from logging and geothermal development by the Monument. It preserves the habitat of one of Oregon's rarest endemics, *Botrychium pumicola*, the pumice grapefern, which is awaiting Federal listing under the Endangered Species Act. It preserves significant examples of five major plant communities from the riparian along the Deschutes River to the subalpine at Paulina Peak, including climax pine ecosystems. NPSO was involved in the Newberry proposal from its inception three years ago. The High Desert Chapter, the State Board, and individual members statewide contributed to the effort. Your support has paid off! Come and visit our newest Monument!

CYANIDE HEAP-LEACHSTRIP MINING FOR GOLD

The Middle East crisis affects us in ways we don't yet know. Each price rise in gold brings cyanide heap-leach mining closer to reality in Oregon. Over 70,000 gold claims have been filed on Oregon public lands in the last three years.

One mine (Grassy Mountain in Malheur County just west of the Owyhee Reservoir) is well along in the permit process and a handful of others are close behind. The High Desert Chapter, the State Board, and numerous members have expressed a high level of concern that effects on vegetation and rare plants from this type of mining could be severe, and that it should be closely regulated in Oregon to minimize environmental impacts.

The Grassy Mountain Plan of Operations calls for placing tailings on the probable site of the rare

Lupinus biddlei, Biddle's Lupine. *Eriogonum crosbyi*, Crosby's buckwheat, was an indicator plant for gold in Nevada and populations there were lost. Malheur County has a number of rare and endangered local endemics. We must be certain that things are different here. Plant surveys must be thorough and reclamation must be complete. Practices should encourage natives and discourage exotics. The BLM and USFS should be held to high environmental standards.

This issue is likely to reach a high profile in the 1991 Oregon Legislature. Our status as the leading educational group regarding native plants and rare plant species in Oregon puts us in an important position to advise on these issues. Reform of the 1872 Mining Law is an essential part of protecting our public lands. NPSO's involvement in this national initiative will be minor but look for some changes to come out of the next Congress. If you wish to be active, let me know. You might also want to lend your support to another grassroots organization which is doing great work:

Concerned Citizens for Responsible Mining
2013 Westridge Drive,
Ontario, Or 97914.

On September 8th we had a very successful Mining Forum in Bend. Sponsored by the BLM, OEC, USFS, and DOGAMI, it was an attempt to air concerns and discuss a variety of mining issues. Environmental problems figured heavily in the conference, which was attended by over 200. A legislative agenda is being prepared by OEC.

BLM SENSITIVE LIST

The state BLM is compiling their first list of rare and endangered species for Oregon. We hope that it will be out soon and will be as comprehensive as the Heritage Database's list. Cheryl McCaffery is pushing this effort and I will report on the results. Let her know you wish all species of concern to be on it.

GRAZING

More attention will be focused on this use of our lands. Progress has been made in making the public, agencies and even the ranchers aware of the problems associated with overgrazing. Russ Jolley's superb efforts to draw attention to problems with grazing in the Gorge is an excellent example of our ability to influence agency policies.

A boycott of beef produced on public lands is in the works. The cry of "Cattle Free by '93" is also being heard. These measures are not the sort of thing that NPSO has supported in the past. I believe (and I think most of our members agree) that cattle don't necessarily need to be totally eliminated from all public lands. They do need to be controlled. Riparian areas need especially to be protected. Uplands need some rest from grazing for their good health. The invasion of exotics and the loss of soils needs to be stopped. Please let me know your personal and/or Chapter views on this issue.

T AND E PLANTS

Stephanomeria malheurenensis, the Malheur wire-lettuce, remains a taxon of concern. As one of three federally listed Oregon plants, we would like to see it doing well. Unfortunately, this annual didn't show up again this year. Since the mid-1980's this plant has been at critically low levels, with no native plants having been seen for three years. In 1987 we cooperated with BLM in planting seedlings at its only known location on a hillside south of Burns. Jay Carlson of the Burns BLM is coordinating the District's recovery plans for this plant and seems to be diligent and concerned. At this time it appears that cheatgrass competition is the most likely reason for its demise. A draft recovery plan is being developed.

Bob Parenti, the Rare Plant Coordinator for the USFWS in Boise, attended our annual meeting and addressed the Board regarding the federal listing process for plants. The bottom line is that he blamed the excruciatingly slow process of listing plants on lack of money and manpower.

A recent internal audit by Department of Interior staff backs this and endorses changes. We must assist in any way we can to making listing a priority and push for it. It will happen eventually. NPSO must help to make sure the plants are still there to enjoy the benefits of being listed.

More good news is that the eastside National Forests have been much better about surveying for rare plants and have been hiring more botanists and locating more sites than ever before. These folks are concerned about non-commodity values and are able to represent this view in agency deliberations. They need our support and encouragement.

---Stu Garrett, MD, Immediate Past President
NPSO and Eastside Conservation Chair

NORTHWEST WEEDS

By Ronald J. Taylor
Montain Press Publishing Co.
Missoula, Montana, 1990

Dr. Taylor, who is a botany professor at Western Washington University, will be known to many readers as the author of *Wildflowers 2--Sagebrush Country* (Touchstone Press, 1974). He subtitles this new book "*The Ugly and Beautiful Villains of Fields, Gardens, and Roadsides*", a phrase summing up many a persons' feelings about weeds as plants that are unattractive and that grow where we humans don't want them to. This perspective may be softened, however, by the many "beautiful villains" which he describes and illustrates, whose form and flowers are really very attractive if viewed objectively (in other words while ignoring their pesky habits).

The book covers 190 species of weeds, representing a wide range of plant families from horsetails, ferns, and grasses to daisies and dandelions. For each plant there are one or more color photographs, usually including a close-up of the flowers or fruits. These illustrations are, on the whole, well selected for the book's purpose, showing the diagnostic traits of each weed and allowing the reader to distinguish between 'look-alikes'. Users of the book will also find the written descriptions to be a help in discriminating among various closely related species. Included in the text are a glossary and illustrations of technical botanical terms, as well as a bibliography of 14 reference books. An additional book that this reviewer suggests should be on the list is "*Gilkey's Weeds of the Pacific Northwest*" by Lu Rea J. Dennis and available from the Oregon State University Book Store.

Dr. Taylor's book is primarily an identification manual, rather than a textbook of weed science. Miscellaneous informative facts are provided along with the species descriptions. However, the weeds are not listed or indexed by the crops they infest, their edibility or possible poisonous effects (e.g., those dangerous to humans or to particular livestock), or by a scale of ratings from the truly noxious to merely an occasional nuisance. In practical terms, the book should be a great help in determining the correct names for those familiar plants we see every day, thriving in habitats created or disturbed by us humans.

---Ken Chambers, Corvallis Chapter,
Curator OSU Herbarium

NEWBERRY'S GENTIAN, AND THE EFFECT OF BIASED COLLECTIONS ON TAXONOMY

Recently, I collected a specimen of *Gentiana newberryi* from a meadow near McKenzie Pass in the central Cascades. The flowers on my sample were withered but persistent at this date, and the plants were in fruit. This species is on the Oregon Natural Heritage Program's List 2 (taxa threatened in Oregon but more common or stable elsewhere), so I looked at specimens of gentians at the OSU herbarium to confirm the identity of my material. To my surprise, only one out of several dozen collections had a plant with a fruit.

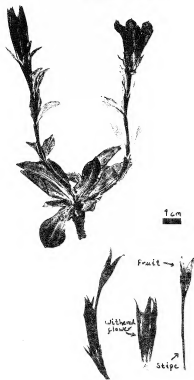
Not only did this make it difficult to identify my specimen (which Dr. Ken Chambers was, fortunately, able to do), it pointed out a need for specimens of gentians with mature fruits. Upon checking the technical descriptions of *G. newberryi*, it was apparent that mature fruits of the species had rarely been observed by taxonomists. The fruits of this species are *described* as being held atop an 8 mm stipe. But the stipes on my specimens were 40-50 mm long, elevating the fruit to a position far above the withered flower! In fact, most species of gentian are described as having short stipes, but I suspect that longer stipes, apparent only on specimens with mature fruits, are the norm. If the stipe were to remain short and fail to lift the fruit, the fruit would dehisce within the dried corolla and seed dispersal would be restricted—a trait usually not favored by natural selection.

The problem is that gentians are most conspicuous in flower, and they flower late. This makes the collection of plants in fruit doubly unlikely, because collectors are often attracted to the showiest individuals in a population, and, by the time gentians are in fruit, many collectors have completed their field season. The result is a dearth of information on gentian fruiting morphology available to taxonomists, leading to an in-

complete (if not misleading) taxonomy. Unfortunately, this may be the case with many genera of plants.

So, if you collect plants and you find gentians in fruit, collect a specimen (if the population will allow), and deposit it at a local or regional herbarium.

— Tom Kaye
Corvallis Chapter



Newberry's gentian in flower and fruit. Note the elongate stipe. (Illustration submitted by Tom Kaye.)

RARE PLANT FOCUS OF COOPERATIVE STUDY

The Long Tom Area of Critical Environmental Concern (ACEC) is a mere seven acres of public land isolated in the Willamette Valley about ten miles northwest of Eugene. It is located in the floodplain of the Long Tom River, north of Fern Ridge Reservoir. It has been singled out as the focus of a study on the survival of a rare plant, *Lomatium bradshawii*, Bradshaw's parsley.

Lomatium bradshawii is a historic inhabitant of the Willamette Wet Prairie Ecosystem and was listed in 1988 on the Federal Endangered Species list by the US Fish and Wildlife Service. Laws require that any publicly owned lands containing endangered or threatened plant species be managed to perpetuate the existence of these species.

Since very little was known about the plant's ecology, BLM initiated a cooperative study to improve our knowledge. The study is a cooperative effort between BLM's Eugene District, the Nature Conservancy and OSU. The purpose of the study was to establish a permanent monitoring program for the plant at this site. The study began in the spring of 1990 and is coordinated by BLM Botanist Nancy Wogen. Most of the actual work is being accomplished by OSU graduate student Kathy Connelly with a \$7,000 matching grant from BLM. Ms. Connelly is conducting the study in association with the completion of a MS degree in Range Resources/Ecology. The study consists of establishing transects and plots to measure the changes in community structure of the prairie and to study the population dynamics of *Lomatium bradshawii* in response to prescribed fire. Fire isn't new to this area. Historically, fire contributed to the maintenance of an extensive open prairie throughout the Willamette Valley. The study site was burned in mid-September under the direction of the BLM Fire Management Specialist. The prescribed fire was a success although the optimum results of total woody material elimination were not obtained. An evaluation and final study report are being prepared and should be finalized by early 1991. The study should provide BLM with solid baseline information on *Lomatium bradshawii* and the ecosystem upon which it is dependent. BLM will be in a better position to manage this rare plant and ensure its existence in the future.

--Doug Huntington, BLM Public Affairs
Director, Eugene Office

EMERALD CHAPTER SURVEYS "BOMB CRATER" IN NATIONAL FOREST MEADOW

Last summer, Emerald Chapter Vice-President Tom Pringle was climbing Mount David Douglas in the Willamette National Forest east of Eugene. Gazing at a mountain meadow below, he noticed a strange, doughnut-shaped disturbance. Hiking down for a closer look, he was startled to discover an enormous, manmade excavation in the meadow. Pringle was reluctantly drawn to the conclusion that the agent of destruction was a ring of dynamite used literally to blast a "bomb crater" in the midst of a fragile meadow ecosystem.

Emerald Chapter decided to visit the meadow on Oct. 13 to assess the disturbance. On Sept. 27, our conservation co-chair wrote the Willamette National Forest asking if their wildlife biologists and botanists might accompany us on this trip. We also asked what the rationale was for this disturbance, and we further wanted to know if plant lists existed for the area and whether permits had been obtained and if mitigation was planned. Finally, we asked for a list of other sites where this sort of activity had taken place or was planned. We had no written reply nor acknowledgement of our letter by the time we took our field trip; however, an Oakridge District botanist accompanied Pringle to the site before the trip.

Shrugging off wet conditions from above and below, 7 Emerald Chapter members visited Wall Creek Bog on a rainy Saturday, Oct. 13. The beautiful low-elevation bog is at about 2920 ft. It is in Oakridge Ranger District, off Salmon Creek Road. We drove north of Oakridge toward Blaire Lake Meadow, then turned off on High Prairie Road. The bog nestles beside bubbling Wall Creek in a gorgeous patch of moss-festooned ancient forest. We were able to learn that the bog was dynamited in 1987, but the scars are still open and ugly. Despite the late season, our field trip participants were able to start a plant list for the area. Later, with the kind help of Dr. David Wagner of the UO Herbarium and Dr. John Christie of the Nature Conservancy, a preliminary list of 37 species, many of them sedges, rushes, mosses and liverworts, was compiled. Plants of interest include: Poison water hemlock, *Cicuta douglasii*; the insectivorous sundew, *Drosera rotundifolia*; *Dulichium arundinaceum*, an unusual sedge; the thallose liverwort, *Marchantia polymorpha* and the mosses, *Meesia triquetra* and *Aulacomnium palustre*.

After the trip, on Oct. 15, Tom Pringle wrote the Willamette National Forest again asking for the information requested in our Chapter's September letter. Finally, on Nov. 2, the Forest Service responded to our letters. They apologized for not answering sooner and admitted that for the blasting and back hoe projects, Decision Notices were not done and other NEPA-related actions were not performed! They stated that no interdisciplinary planning effort was involved and no professional botanical input was utilized. However, they assure us that if such actions were taken today, they would proceed differently, and they further request NPSO input on management decisions on the Willamette National Forest.

Please watch these pages for an update on what we hope will not become an agency trend to blast holes in forest meadows. Let Tom Pringle know if you find evidence of similar activity on other Federal land. His number is (503) 484-0669. We hope to be able to write a more comprehensive article when we learn the Forest Service's rationale for this "management" of our public lands.

---Tom Pringle and Rhoda Love
Emerald Chapter, Eugene

GRANT PROPOSALS REQUESTED

The Native Plant Society of Oregon will continue to sponsor small research grants. The objectives of the program are: 1) to stimulate basic field research into the biology and distribution of Oregon's native and naturalized flora and vegetation, particularly in the more remote areas of the state, and 2) to promote native plant conservation through better understanding of Oregon's flora and vegetation and the factors affecting their survival. Also, priority will be given to designation of the Leighton Ho Field Botany Award as a matching grant for a cooperative project with The Nature Conservancy. Information on TNC's research needs can be obtained from Cathy Macdonald, Director of Stewardship, 1205 NW 25th, Portland, OR 97210. (503) 228-9561.

Those interested in applying for funding can obtain a copy of the program policy and guidelines from Dan Luoma, Research Grants Committee Chair, 2912 N.W. Arthur Ave., Corvallis, OR 97330. Research proposals are due by March 1, 1991.

---Dan Luoma

REMEMBER LEIGHTON HO (1951-1987) DURING THIS HOLIDAY SEASON

My good friend, Leighton Chee Won Ho, died in a tragic drowning accident on the island of Kauai, Hawaii on December 20, 1987. I think of Leighton often, but I remember him especially at this holiday season as the anniversary of his inexplicable death approaches. Leighton was the president of NPSO's Emerald Chapter from 1983 through 1985, and during his presidency he helped our chapter become involved in a number of important environmental issues, including the fight to establish the Waldo Lake Wilderness and our efforts to conserve coastal ecosystems.

When Leighton died, contributions from his many friends and from his bereaved parents in Hawaii poured in to NPSO, and the Leighton Ho Memorial Fund was established in his name. A special account was opened in Feb., 1988 and the funds and interest they accrue were dedicated to the awarding of an annual Leighton Ho Field Botany Award for summer botanical research.

The first recipient of the Leighton Ho Award was Jennifer Dimling of Eugene (now Emerald Chapter president), who used her \$400 to study *Sidalcea* in southwest Oregon. The second year's award was to Robert Misley of Clackamas Community College who studied *Delphinium leucophaeum*. This year's award, the third, was matched by The Nature Conservancy and used to study *Silene spaldingii*.

Outgoing NPSO Treasurer Daphne Stone has just informed me that the Leighton Ho Fund presently contains \$2,048 and that it earns approximately \$100 in interest each year. The Leighton Ho Field Botany Award is given annually and amounts to \$400. Some simple arithmetic reveals that, at the very least, \$300 in contributions to the fund need to come in each year if NPSO is to be able to offer this award year after year.

Please follow my example during this season of giving and, as you pay your NPSO dues, or write your end-of-year checks to charitable organizations, send a contribution to the NPSO Leighton Ho Fund. I don't mean to be disrespectful to the memory of a cherished friend when I remind you that during this season of HO HO HO, you may wish to remember our own LEIGHTON HO. Many thanks and happy holidays to you all.

---Rhoda Love, Emerald Chapter

1961 *** NPSO *** 1991

30th ANNIVERSARY ANNUAL MEETING
COME JOIN US FOR THE BIG BIRTHDAY PARTY!

MARK YOUR CALENDARS NOW:

**MEETING TO BE HELD ON THE
UNIVERSITY OF OREGON CAMPUS, EUGENE**

**FRIDAY, SATURDAY AND SUNDAY
JUNE 14, 15, 16**



(The University of Oregon)

**Banquet Speaker: Dr. Linda R. McMahan,
Executive Director, Berry Botanic Garden**

HOSTED BY EMERALD CHAPTER

* * *

Registration Materials and More Information
in your January BULLETIN

Annual Meeting Chair: Charlene Simpson

HISTORY OF THE JEAN DAVIS AWARD

The Jean Davis Memorial Scholarship fund was established in August 1979 in memory of Jean Davis, who passed away while on a field trip in the Cascades with several other members of the Willamette Valley Chapter of NPSO.

Jean was a charter member of the Willamette Valley Chapter, and her husband felt this was the way he wanted to honor her. A request for donations to the fund in lieu of flowers was made and several sizable donations were received. Mr. Davis then increased the fund to \$10,000 and a committee was formed to set up guidelines for the recipients of the scholarships.

After deliberations it was decided that the recipient must be one that will be attending an Oregon college, and plans to study plant systematics or plant ecology. The recipient is to have completed at least two years of satisfactory college work by July 1 of the year of application and be a full time student. Graduate students may be eligible if they meet all qualifications except that of being a full time student. The award is in the amount of \$1000, and will be paid directly to the school of choice, to be used toward tuition within the following academic year.

Applications are available from Mary Falconer, Chairman, Scholarship Committee, 1920 Engel Avenue NW, Salem, Oregon 97304. They must be completed and sent to the above address no later than April 1 of the year of applications. The award will be made by May 1 and is usually announced at the NPSO Annual Meeting.

Since the establishment of the fund there have been some donations in memory of other NPSO members. Any donations will be gladly accepted and should the fund grow to the necessary size there could be additional scholarships awarded.

From these funds NPSO will award a scholarship to a worthy student in an Oregon college, with his or her major study in plant systematics or plant ecology. The scholarship is in the amount of \$1000, to be used toward the student's tuition within the following academic year. Deadline of applications is April 1. The award will be made by May 1.

Donations to the scholarship fund are tax deductible and are welcome at any time. All interest earned from the donations is apportioned

to as many scholarships as possible in the spring of each year, at \$1000 each. All communications regarding this fund should be addressed to:

Mary Falconer,
Scholarship Committee Chair
1920 Engel Avenue NW
Salem, Oregon 97304

RULES FOR SCHOLARSHIP AWARDS

- 1) Scholarships are available to students in Oregon colleges, planning their major study in plant systematics or ecology.
- 2) Scholarships are awarded in the amount of \$1000 to worthy students who will complete at least two years of satisfactory college work by July 1 of the year of receipt of application and are full time students. Graduate students may be eligible if they meet all qualifications except that of full time student.
- 3) Awards are made in the following manner:
 - a) A certificate is presented to the recipient.
 - b) A check in the amount of the award is submitted to the school of choice, as set forth in rule 1, to be used toward tuition within the following academic year.
- 4) If an award recipient fails to enroll, changes his or her major, or leaves the school before completing the period for which the award was granted, the full amount or unused part of the money shall be returned to the Jean Davis Memorial Scholarship Fund.
- 5) Applicants are required to submit:
 - a) In their own handwriting, a statement of academic and career intent.
 - b) Two letters of reference from persons able to judge the student's ability to successfully complete study in the area of plant systematics or plant ecology.
- 6) All applications together with items listed in rule 5 must be received by the Scholarship Committee Chair no later than April 1. The award will be made by May 1.
- 7) Scholarships cannot be granted to Scholarship Committee members or their relatives.

---Mary Falconer
Willamette Valley Chapter

BITS AND PIECES

—News and Information From All Over

FOREST SERVICE TO STUDY HEALTH OF BLUE MOUNTAIN FORESTS

Regional Forester John Butruille has appointed a task force to study the health and condition of the Malheur, Umatilla, and Wallowa-Whitman National Forests. Damage from insects and disease have been aggravated by several drought years, and there is concern in the Forest Service that measures need to be found to restore these forests to a healthy condition.

The task force is chaired by Bill Gast, Deputy Forest Supervisor of the Wallowa-Whitman National Forest. Other members of the committee are Entomologist Don Scott, Pathologist Craig Schmitt, Ecologist Charlie Johnson, and Silviculturist Dave Clemens. All are Forest Service employees.

The task force will work closely with the Blue Mountains Natural Resources Institute. The Institute is a LaGrande-based body of county, state, and federal officials concerned with overall forest health. The stated goal of the study is to analyze the condition of the three forests and recommend procedures to rehabilitate them and maintain their health in the long term. The six month study is due for completion in March 1991. Bill Gast states that any actions recommended will be consistent with forest plans already in effect.

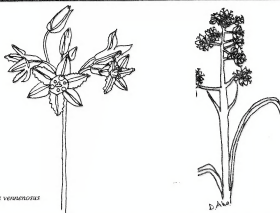
THE NORTHWEST ENVIRONMENTAL JOURNAL

The Institute for Environmental Studies of the University of Washington has for several years published the *Northwest Environmental Journal*. This twice-yearly publication covers western Canada, Alaska, Idaho, western Montana, Oregon and Washington. Each issue contains about 175 pages on contemporary environmental subjects, book reviews, research notes and an interview. All articles are pertinent specifically to our Northwest region.

Recent articles have focused on wood smoke effects and legislation, gray wolves in the North Cascades, wetlands and estuaries, regional solar access protection, Hanford, spotted owls, old growth and environmental issues surrounding oil. Members wishing to keep up to date on regional environmental concerns and conflicts may find this Journal of value.

A one year subscription currently costs \$22 for individuals, or \$14 for one issue. Orders or inquiries should be sent to:

Journal,
Institute for Environmental Studies (FM-12)
University of Washington
Seattle, Wa., 98195



Brodiaea douglasii and *Zigadenus venenosus*
Drawings by Diane Aho

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BULLETIN

EDITOR..... Bryan Boyce..... 13285 S. Clackamas River Drive, Oregon City 97045-9411; 655-4457

GUIDELINES FOR CONTRIBUTORS

The NPSO *Bulletin* is published monthly, as a service to NPSO members and the public. Contributions of all types are welcome.

Deadline: Copy is due with the editor by the 10th of the month.

Text Format: Submissions can be in any form. Camera-ready copy should be in 3.334 in. wide columns up to 9.3 in. long, with spacing between columns .22 in. The *Bulletin* uses 12 point "Times" font. Author's name and affiliation are added at the end of the article. Double space between paragraphs, and do not indent paragraphs. For special materials (e.g., plant keys) choose an appropriate format, keeping in mind that readers may wish to carry your article posted inside their favorite field guide.

Computer Disks: The editor prefers articles submitted on Macintosh

or IBM disks. Please contact the Editor for further details.

Illustrations: Line drawings and high contrast B&W prints are acceptable. Contact the editor about our current needs, or send along with your article.

Credits: If the item is not original, name and date the source. For original items, identify the author and indicate, for news items, if a by-line is desired. Indicate whether the item is to be used in its entirety or excerpted at the Editor's discretion. **Scientific Names:** Nomenclature should follow *Flora of the Pacific Northwest* by Hitchcock et al., when appropriate. Use of both scientific and common names is encouraged. *Italicize* genus and species (underline if italic is not available).

Return of Originals: Submissions will not be returned unless requested.

Membership in the Native Plant Society of Oregon is open to all.

Membership applications, renewals, and changes of address (include old address and zip code) should be sent to the MEMBERSHIP CHAIR.

NATIVE PLANT SOCIETY OF OREGON MEMBERSHIP FORM

Name _____ Chapter (if known) _____
 Address _____ Is this a change of address? _____
 If so, please write your Old Address here: _____
 City _____ State _____ Zip+4 _____
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* **DUES** include monthly NPSO *Bulletin*. Full membership is for a calendar year, January through December. New memberships enrolled during September through December are charged a reduced "Quarter Membership" rate.

() New () Renewal () Quarter Membership (Sep.-Dec.) \$3.00 () *Bulletin* Subscription only \$12.00
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* All contributions to the Native Plant Society of Oregon, a non-profit organization, are tax deductible. Please make checks for dues and contributions payable to NATIVE PLANT SOCIETY OF OREGON. Send completed form and full remittance to:

Mary Falconer, NPSO Membership Chair, 1920 Engel Court NW, Salem, Oregon 97304.

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